No. 25-__

In the Supreme Court of the United States

MORELAND PROPERTIES LLC,
Petitioner,

v.

GOODYEAR TIRE & RUBBER CO.
AND GOODYEAR FARMS, INC.,
Respondents.

On Petition for Writ of Certiorari to the United States Court of Appeals for the Ninth Circuit

PETITION FOR WRIT OF CERTIORARI

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QUESTION PRESENTED

Under CERCLA, private parties who clean up contaminated land may recover their costs from polluters only if their cleanup substantially complies with the National Contingency Plan. 42 U.S.C. § 9607(a). When the United States government, a State, or an Indian tribe conducts a cleanup itself, it enjoys a presumption of compliance with the National Contingency Plan. *Id.* And when private parties obtain EPA approval of their cleanup, they too enjoy a presumption of compliance. 40 C.F.R. § 300.700(c)(3)(ii).

The question presented, which has divided the circuits 3-4, is whether a private party whose cleanup is reviewed and approved by a State likewise enjoys a presumption of substantial compliance with the National Contingency Plan.

RULE 14.1(b) STATEMENT

The parties listed in the caption were parties to the proceeding below. There are no related proceedings.

Pursuant to this Court's Rule 29.6, undersigned counsel states that Moreland Properties, LLC is a privately owned limited liability company and that no parent corporation or publicly held corporation owns 10% or more of its stock.

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PETITION FOR WRIT OF CERTIORARI

The Comprehensive Environmental Response, Compensation, and Liability Act ("CERCLA") covers more sites than the federal government can remediate on its own. The statute therefore includes procedures to entice States and private parties to conduct cleanups. Central to that structure is a private party's ability to recover cleanup costs from those responsible for the contamination. 42 U.S.C. § 9607(a)(4)(B). The condition for cost recovery is that the cleanup be "consistent with the national contingency plan." *Ibid.* Contesting that condition is a polluter's best chance to avoid the expense of cleaning up its mess, leaving the later property owner who actually did the work stuck with the tab.

Where that strategy succeeds, it destroys CERCLA's goals of achieving "timely cleanup of hazardous waste sites" paid for "by those responsible for the contamination." *Burlington N. & Santa Fe Ry.* v. *United States*, 556 U.S. 599, 602 (2009). Specifically, owners of contaminated land lose the incentive to invest in remediation in proportion to the risk that the responsible party can convince a court doing *post hac* review that the cleanup was somehow inconsistent with one of the National Contingency Plan's ("NCP's") many elements.

To solve this problem and preserve the incentive for private response actions, the statute calls upon federalism. The States play an essential role in CERCLA's operation. Among other things, States'

own cleanup operations presumptively comply with the NCP, and their approval of a private cleanup limits the federal government's ability to take further action at the site. 42 U.S.C. § 9628(b)(1)(A).

Three circuits have held that State oversight and approval of a private response has a similar effect vis-à-vis responsible parties—that is, if a State regulator determines that a cleanup is sufficient under a State regime that tracks the federal CERCLA requirements, the cleanup is presumed to substantially comply with the NCP. That rule cuts off the gamesmanship by which polluters evade responsibility by nitpicking completed cleanups to argue inconsistency with the NCP. The First, Second, and Seventh Circuits have concluded that permitting that second-guessing of a State-approved cleanup makes no sense in light of the role States play under CERCLA.

Four other circuits—the Sixth, Eighth, Ninth, and Tenth Circuits—do not recognize State oversight and approval as establishing substantial compliance with the NCP. The result, as this case demonstrates, is that courts in these circuits scrutinize the very same response that State regulators approved before implementation and certified after its completion. Without the presumption of consistency with the NCP, property owners undertake State-approved response actions at their own financial risk. That approach is contrary to both the incentives CERCLA attempts to create and the spirit of cooperative federalism at its core. The Court

should grant certiorari to resolve the split and restore States to their proper role.

OPINIONS BELOW

The decision by the Court of Appeals for the Ninth Circuit is available at 2025 WL 2452372 and reproduced at App. 1a. The district court decision is available at 2023 WL 11963448 and reproduced at App. 20a.

JURISDICTION

The Ninth Circuit issued its decision on August 26, 2025. App. 1a. On November 4, 2025, Justice Kagan extended the time within which to file a petition for a writ of certiorari to and including December 24, 2025. This Court has jurisdiction under 28 U.S.C. § 1254(1).

PERTINENT STATUTORY AND CONSTITUTIONAL PROVISIONS

The central statute in this case is the cost-recovery provision in Section 107 of CERCLA, which provides, in relevant part:

> Notwithstanding any other provision or rule of law, and subject only to the defenses set forth in subsection (b) of this section—
>
> . . .
>
> any person who at the time of disposal of any hazardous substance owned or operated any facility at which such hazardous substances were disposed of, . . . shall be liable for . . . any other necessary costs of response

> incurred by any other person consistent with the national contingency plan . . . .

42 U.S.C. § 9607(a).

STATEMENT OF THE CASE

I. Statutory, Regulatory, and Factual Background

A. CERCLA Cost-Recovery

CERCLA "is not a model of legislative draftsmanship." *Exxon Corp.* v. *Hunt*, 475 U.S. 355, 363 (1986). Its famously labyrinthine provisions include a variety of options for responding to pollution and countless delegations to EPA to promulgate rules to make the system work. This case focuses on private cleanups that State regulators have reviewed and approved.

When Congress adopted CERCLA, it recognized that EPA lacks resources to clean up every contaminated parcel in the country. CERCLA therefore empowers States and private parties to clean their own land and recover their response costs from the persons responsible for releasing the contaminants in the first place. 42 U.S.C. § 9607(a). States may seek cost recovery for actions "not inconsistent with" the NCP; private party actions must be "consistent with" the NCP. 42 U.S.C. § 9607(a)(4)(A)–(B). EPA defines an action as "'consistent with the NCP' if the action, when evaluated as a whole, is in substantial compliance with the applicable requirements [of the

NCP] and results in a CERCLA-quality cleanup." 40 C.F.R. § 300.700(c)(3)(i). The regulation's holistic approach and substantial-compliance threshold are consistent with the Court's construction of CERCLA to ensure a prompt cleanup at the polluter's expense. *Burlington N.*, 556 U.S. at 602.

Unsurprisingly, polluters routinely dispute not only their classification as potentially responsible parties ("PRPs") but also whether the completed cleanup was consistent with the NCP. The strategy is always the same: identify picayune departures from CERCLA's dizzying regulations and contend that they add up to non-compliance. This attack always occurs with the benefit of hindsight, without any contemporaneous indication that the polluter disagreed with the response, and freed from the chore of actually complying with CERCLA. To reduce the risk of such tactics and ensure a CERCLA-quality cleanup, owners of contaminated land have two choices: either wait for the government to conduct a cleanup itself or obtain the government's preapproval for the course of action the property owner proposes to undertake. The former is inconsistent with prompt cleanup; the latter is at issue in this case.

B. Cooperative Federalism

EPA cannot oversee every environmental response in the country. Congress adopted CERCLA in 1980 "after receiving estimates that there were approximately 30,000–50,000 contaminated sites across the country; more recent estimates reach into

the hundreds of thousands." Ronald G. Aronovsky, *Federalism and CERCLA: Rethinking the Role of Federal Law in Private Cleanup Cost Disputes*, 33 Ecology L.Q. 1, 7–8 (2006). Mindful of that limitation, Congress gave the States a central role in regulating and approving response actions. U.S. Amicus Br., *Niagara Mohawk Power Corp. v. Chevron U.S.A. Inc.*, 2008 WL 10610074, at *4–5 (2d Cir. Dec. 29, 2008). The States' role begins with setting the standard to which contaminated land must be remediated. In determining the necessity and degree of remediation, CERCLA requires PRPs to satisfy the standards set by the State, even if those standards are more exacting than federal law. 42 U.S.C. § 9621(d)(2)(A)(ii). As to the performance of specific response efforts, the States are entitled to "substantial and meaningful involvement by each State in initiation, development, and selection of remedial actions to be undertaken in that State." 42 U.S.C. § 9621(f)(1).

And the States' role remains central in confirming that cleanups substantially comply with the NCP and are therefore eligible for cost recovery. Where the State itself conducts a response action under State law, its cleanup presumptively complies with the NCP. See, *e.g., Pub. Servs. Co. of Colo.* v. *Gates Rubber Co.*, 175 F.3d 1177, 1183 (10th Cir. 2006) (contrasting presumption for government cleanups with need for proof for private parties); *Fireman's Fund Ins. Co.* v. *City of Lodi*, 302 F.3d 928, 949 (9th Cir. 2002) (same).

Moreover, when a State approves a private party's response action as "in compliance with the State program that specifically governs response actions for the protection of public health and environment," that compliance limits federal officials' ability to pursue either enforcement or cost recovery actions in connection with the release. 42 U.S.C. § 9628(b)(1)(A). That is, if a response is adequate for the State, it is adequate for EPA. These various provisions reflect the "spirit of cooperative federalism that runs throughout CERCLA and its regulations." *Atl. Richfield Co.* v. *Christian*, 590 U.S. 1, 24 (2020) (quotation and modification omitted).

CERCLA also gives the federal government a mechanism for blessing a State's regulatory regime. If a State's response program includes "oversight and enforcement" to ensure response actions "will . . . be conducted in accord with Federal and State law," those States are eligible for grants to assist with cleanups. 42 U.S.C. §§ 9628(a)(1)(A)(i), 9628(a)(2). Arizona has qualified under that provision. See, *e.g.,* Michael Brogan, "EPA Awards $2.5 Million in Grants to Assess and Clean Up Arizona Communities," United States Environmental Protection Agency: News Releases (last updated June 4, 2025), *available at* https://tinyurl.com/4xvt8yxd. Thus, according to EPA, Arizona's environmental response program assures compliance with federal law, which includes the requirement that private response actions substantially comply with the elements of the NCP.

Importantly, ***EPA's*** approval of a private party's response action—either via an administrative order under 42 U.S.C. § 9606 or a consent order under 42 U.S.C. § 9622—confers a presumption of compliance with the NCP. 40 C.F.R. § 300.700(c)(3)(ii) ("Any response action carried out in compliance with the terms of an order issued by EPA pursuant to section 106 of CERCLA, or a consent decree entered into pursuant to section 122 of CERCLA, will be considered 'consistent with the NCP.'"); *Morrison Enters. v. McShares, Inc.*, 302 F.3d 1127, 1136–1137 (10th Cir. 2002).

In sum, response actions conducted by the States themselves or conducted by private parties with EPA's approval are presumptively compliant with the National Contingency Plan. And a State's approval of a private cleanup prevents the federal government from taking any enforcement action against the private party. What remains is a circuit split on whether a private response approved and overseen by State officials is also presumptively compliant with the NCP. That is the question presented here.

C. Factual Background

Petitioner Moreland Properties unknowingly bought a parcel of land soaked in arsenic. In fact, with peak concentrations reaching 800 mg/kg, the arsenic on the property was eight times higher than what is "considered too toxic for local landfills." *Atl. Richfield*, 590 U.S. at 35. Moreland discovered the pollution when taking soil samples at the request of

a developer who expressed interest in buying the property. The buyer walked away, and Moreland notified the Arizona Department of Environmental Quality (ADEQ). Years earlier, ADEQ had approved a Declaration of Environmental Use Restriction (DEUR) that Respondent Goodyear Tire & Rubber Company recorded on the parcel. That document stated that residual, post-cleanup arsenic concentrations were 10 mg/kg—exactly the maximum permitted under Arizona law. 3-ER-161–171. But Moreland's 2017 sampling indicated that the representation in the DEUR was incorrect.

Over the following two years, Moreland discussed with ADEQ different sampling methodologies, potential modification of the DEUR, and the extent of contamination at the parcel. Initially, Moreland and ADEQ discussed the possibility of taking no remedial action at the site, but both agreed that protection of public health and the environment required action. App. 30a. From those discussions, Moreland and the agency entered an administrative settlement patterned after 42 U.S.C. § 9622, pursuant to which Moreland produced its Work Plan for the Removal Action to Address Residual Arsenic Contamination. App. 57a. ADEQ reviewed the plan under State law and approved it on September 30, 2019, finding that it would "remediate the property through excavation [and] reduce concentrations in arsenic and toxaphene, thereby bringing concentrations in compliance with the concentrations cited in the existing [DEUR]." App. 96a.

After Goodyear declined to implement the ADEQ-approved cleanup, Moreland proceeded to carry out the work plan under ADEQ's supervision. Less than a year later, Moreland completed the work and submitted its three-volume Summary Report to ADEQ on July 28, 2020. 3-ER-215–247. The agency reviewed the report, asked questions of Moreland, and three months later, "confirm[ed] that Moreland Properties, L.L.C. has complied with its obligations under the settlement agreement." App. 98a.

Under Arizona law, "[a]ny remedial action so approved by the director shall be deemed to be in substantial compliance with the rules and procedures adopted pursuant to section 49-282.06." Ariz. Rev. Stat. § 49-285(B). The cross-referenced provision authorizes a panoply of State rules that mirror CERCLA, including requiring that private cleanups "[a]ssure the protection of public health and welfare and the environment," and are "reasonable, necessary, cost-effective and technically feasible." Ariz. Rev. Stat. § 49-282.06(A). These State-law criteria track CERCLA's requirement that "effectiveness," "implementability," and "cost" "shall be used to guide the development and screening of remedial alternatives." 40 C.F.R. § 300.430(e)(7). Arizona law also requires that "community involvement activities shall be conducted appropriate to the scope and schedule of the remediation." Ariz. Rev. Stat. § 49-176. ADEQ's approval confirmed satisfaction of these conditions.

II. Proceedings Below

In November 2020, Moreland brought State-law fraud claims and a cost-recovery action pursuant to 42 U.S.C. § 9607. Despite facts discovered during the lawsuit that Goodyear fabricated most of the samples to justify the DEUR and knew that more cleanup was necessary, the district court dismissed Moreland's fraud case on statute of limitations grounds. Moreland's federal CERCLA claim proceeded to a bench trial. Following trial, the district court held that the State's oversight and approval under the administrative settlement was insufficient to establish substantial compliance with the NCP because Arizona offers a second option—apart from administrative settlements—by which private parties may conduct response actions. App. 33a, 48a. That option, known as the Voluntary Remediation Program ("VRP"), differs from an administrative settlement in two ways: (1) the fees that the landowner must pay ADEQ, and (2) the benefit the landowner obtains—a "No Action" letter for VRP cleanups, and a covenant not to sue in the case of an administrative settlement. App. 31a. Preferring lower fees and more robust relief, Moreland entered an administrative settlement. Unlike the VRP program, Moreland's Administrative Settlement Agreement required ADEQ's review and approval of the work plan and final report, rather than allowing Moreland to seek approval of "remedial actions already performed." Ariz. Rev. Stat. § 49-173(A)(4)(b).

The district court found insufficient State involvement on the (mistaken) assumption that ADEQ "did not evaluate the Work Plan as rigorously as it would have under the VRP program." App. 33a. As a result, the court proceeded to evaluate Moreland's substantial compliance with the NCP and held that Moreland did not substantially comply.

Moreland appealed to the Ninth Circuit, which avoided the issue of State oversight entirely and proceeded to bless the district court's reasoning on substantial compliance, specifically faulting Moreland for relying on older feasibility studies that the court believed were focused exclusively on toxaphene rather than arsenic. App. 18a. Although not material to this appeal, that holding is mistaken because the earlier studies responded to soil sampling finding elevated levels of both arsenic and toxaphene, making Moreland's and ADEQ's reliance on the older studies reasonable and cost-effective. The Ninth Circuit did not address the decisions in three sister circuits that would have found substantial compliance with the NCP based on ADEQ's oversight and approval. The panel nevertheless necessarily rejected those decisions by analyzing substantial compliance and finding it lacking. Importantly, the Ninth Circuit did not embrace the district court's rule that a private response must proceed under a specific State program to establish substantial compliance.

On petition for rehearing, Judge Graber reversed course on Moreland's fraud claim, but the panel did

not reconsider its approach to CERCLA. App. 9a, 11a.

REASONS FOR GRANTING THE PETITION

The Ninth Circuit's decision is the latest addition to a deep division in the circuit courts as to whether State review and approval of a private party's CERCLA cleanup establishes substantial compliance with the NCP. The First, Second, and Seventh Circuits hold that it does; the Sixth, Eighth, Ninth, and Tenth Circuits hold that it does not. See Part I *infra*.

Only this Court can resolve the division. It should do so in this case, which presents an ideal vehicle because substantial compliance with the NCP is the sole element on which the Ninth Circuit denied Moreland cost recovery. See Part II *infra*. And the stakes for both federalism and the environment are considerable. The resolution of the question presented will shape the incentives for private parties to conduct environmental cleanups and define the cooperative federalism that undergirds CERCLA. See Part III *infra*.

I. The Ninth Circuit's Decision Deepens an Acknowledged Circuit Split on Whether State Approval Establishes Substantial Compliance with the NCP.

Congress enacted CERCLA to ensure the prompt cleanup of polluted sites and to allocate cleanup costs to responsible parties. 42 U.S.C. § 9601 *et seq*. In service of those goals, CERCLA authorizes pri-

vate parties to undertake cleanups themselves and recover their costs from those responsible for the contamination. *Id.* § 9607(a). To obtain recovery, private parties must show that their cleanup was "consistent with the national contingency plan," a detailed federal regulatory framework governing the selection of cleanup measures. *Id.* §§ 9605, 9607(a)(4)(B), 9613(f)(1).

Recognizing the burden of proving substantial compliance, CERCLA presumes compliance with the NCP when the United States, a State, or an Indian tribe conducts a cleanup itself. *See, e.g., Gates Rubber Co.*, 175 F.3d at 1183 (contrasting presumption for government cleanups with need for proof for private parties); *Fireman's Fund*, 302 F.3d at 949 (same); 42 U.S.C. § 9607(a)(4)(A).

Similarly, when private parties receive EPA approval for a cleanup, they too enjoy a presumption of compliance. 40 C.F.R. § 300.700(c)(3)(ii). In those instances, private parties need not litigate the NCP's many requirements before obtaining recovery from polluters. The presumption thereby creates an incentive to work with regulators to ensure CERCLA-quality cleanups and limits post hac litigation risk.

The question presented is whether a private cleanup reviewed, overseen, and approved by State officials is also presumptively compliant with the NCP. The Ninth Circuit answered that question in the negative, directly conflicting with the decisions of three circuits and deepening a longstanding cir-

cuit split. The First, Second, and Seventh Circuits hold that a State's review and approval of a private cleanup establishes substantial compliance with the National Contingency Plan. The Sixth, Eighth, Ninth, and Tenth Circuits hold that it does not. In those jurisdictions, courts overlook State approval and give polluters a second chance to dispute substantial compliance with the National Contingency Plan's myriad and often unclear requirements.

A. The Ninth Circuit's Decision Conflicts with Decisions from Three Other Circuits.

Three circuits hold that a private party who undertakes a cleanup subject to State review and approval enjoys a presumption of substantial compliance with the NCP.

1. In *NutraSweet Co.* v. *X-L Eng'g Co.*, 227 F.3d 776 (7th Cir. 2000), NutraSweet, a food manufacturing company, discovered that X-L, a neighboring machine shop, routinely dumped wastewater laden with hazardous chemicals into the soil along the property line. Soil testing revealed high levels of volatile organic compounds on NutraSweet's property. *Id.* at 780. NutraSweet "designed and implemented a plan with Illinois EPA approval and under its supervision," and it "cleaned up the property until the agency told it that the remediation had succeeded to the maximum extent possible." *Id.* NutraSweet then sued X-L seeking recovery of its cleanup costs under CERCLA. *Id.* at 781.

X-L contended that NutraSweet was not entitled to recovery under CERCLA because its remediation did not substantially comply with the NCP. *Id*. at 790–791. The Seventh Circuit recognized that "NutraSweet's compliance with the NCP is required for X–L to be liable." *Id*. at 791. But rather than require NutraSweet to prove compliance with the NCP, the Seventh Circuit instead reasoned:

> The Illinois EPA approved NutraSweet's clean-up plan, and the agency monitored the progress of the remediation. NutraSweet remediated its property until the Illinois EPA advised it that it could stop because NutraSweet's efforts had succeeded to the maximum extent possible. In light of this evidence, we are satisfied that NutraSweet met this requirement [*i.e.*, substantial compliance with the NCP] for a CERCLA recovery.

Ibid. On that basis, the Seventh Circuit rejected X-L's argument and affirmed judgment against X-L for 100% of NutraSweet's cleanup costs. *Id*. at 792.

2. Likewise, in *Bangor* v. *Citizens Commc'n Co.*, 532 F.3d 70 (1st Cir. 2008), the First Circuit held that a private party substantially complies with the NCP when "the remediation work is carried out under the approval and monitoring of the appropriate state environmental agency." *Id*. at 91 (citing *NutraSweet*, 227 F.3d at 791). The First Circuit rea-

soned that under CERCLA, "States are given a special role in defining allowable costs and cleanup standards." *Id.*

3. Most recently, the Second Circuit held that a private party can establish substantial compliance with the NCP by obtaining State review and approval of its response plan. *Niagara Mohawk Power Corp.* v. *Chevron USA, Inc.*, 596 F.3d 112, 136–137 (2d Cir. 2010) (citing *Bangor*, 532 F.3d at 91, and *NutraSweet*, 227 F.3d at 791)).

In that case, the Niagara Mohawk Power Corporation ("NiMo") entered into a Consent Order with the New York Department of Environmental Conservation ("DEC") to investigate and remediate four sites contaminated by industrial activity from several potentially responsible parties ("PRPs"). *Id.* at 118–119. When its work was complete, NiMo brought a CERCLA cost-recovery action against several PRPs. *Id.* at 119. At the summary judgment stage, the PRPs disputed whether NiMo established substantial compliance with the NCP, and the district court found that there was a genuine issue of material fact on that question. *Id.* at 136.

On appeal, the Second Circuit observed that it had "never squarely addressed whether compliance with a state consent decree is sufficient to prove adherence to the National Contingency Plan." *Ibid.* It had previously held that State review and approval was sufficient to satisfy one aspect of the National Contingency Plan, *viz.* the public participation requirement in 40 C.F.R. § 300.700(c)(6). *Bedford Affil-*

iates v. *Sills*, 156 F.3d 416, 428 (2d Cir. 1998) ("Such extensive involvement of a government agency charged with the protection of the public environmental interest is an effective substitute for public comment."). But the PRPs in *Niagara Mohawk*, challenged NiMo's compliance with additional aspects of the National Contingency Plan. 596 F.3d at 128.

In addressing the full effects of State approval, the Second Circuit noted that "Courts presume that actions undertaken by the federal, or a state, government are consistent with the National Contingency Plan." *Id*. at 137. While "private parties that have responded to hazardous substances must establish compliance," the Second Circuit concluded that "one way of establishing compliance with the national plan is to conduct a response under the monitoring, and with the ultimate approval, of the state's environmental agency." *Id*. at 137 (citing *Bangor*, 532 F.3d at 91, and *NutraSweet*, 227 F.3d at 791)).

The Second Circuit relied on both the logic of State approval and the structure of CERCLA's cost-recovery provisions. It noted a "bizarre" consequence of a contrary ruling: "a PRP's settlement with a state entitled it to seek contribution under § 113(f)(B)(3), but its actions taken in executing that settlement disqualified the settlor from employing the statute to recoup a portion of its expenses." *Ibid*. (citing 42 U.S.C. § 9713(f)(B)(3)). Following *NutraSweet* and *Bangor*, the Second Circuit held that "NiMo's adherence to the DEC Consent Decree

established its compliance with the National Contingency Plan." *Ibid.*

Had the current case arisen in any of these three circuits, Moreland could have established substantial compliance with the NCP by establishing that ADEQ reviewed and approved its cleanup.

B. Four Circuits Hold that State Approval Does Not Establish Substantial Compliance.

On the other side of the split, the Sixth, Eighth, Ninth, and Tenth Circuits hold that State review and approval does not establish substantial compliance with the NCP, giving polluters a second chance to dispute the technicalities of cleanup efforts and relegating States to an inferior place in CERCLA's scheme of cooperative federalism.

1. In *Pierson Sand & Gravel, Inc.* v. *Pierson Twp.,* 89 F.3d 835 (Table), 1996 WL 338624 (6th Cir. 1996), the plaintiff entered into a consent judgment with the Michigan Department of Natural Resources ("MDNR") to clean up a landfill. *Ibid.* at *1. MDNR supervised and ultimately approved the plaintiff's cleanup. *Id.* at *5. The plaintiff then sued Pierson Township and other PRPs seeking to recover its cleanup costs under CERCLA Section 107. *Id.* at *1.

The defendants moved for summary judgment, contending that the plaintiff failed to substantially comply with the NCP. *Id.* at *2. The district court entered summary judgment for the defendants, rul-

ing that the plaintiff "failed to carry its burden of showing substantial compliance with the NCP" because it did not "provide sufficient opportunities for appropriate public comment." *Ibid.*

On appeal, the plaintiff contended that "because its cleanup was monitored by MDNR, a governmental agency, public comment was not necessary" to comply with the NCP. *Id.* at *5. The Sixth Circuit rejected that argument: "While governmental supervision of a cleanup may provide some of the guarantees as a cleanup subject to public comment and criticism, the NCP does not allow this type of substitution." *Ibid.* On that basis, the Sixth Circuit affirmed the district court's entry of summary judgment to defendants, foreclosing recovery under CERCLA. *Id.* at *5–6.

2. The Eighth Circuit likewise discounted the import of State approval in *Union Pac. R.R. Co.* v. *Reilly Indus., Inc.*, 215 F.3d 830 (8th Cir. 2000). In *Reilly*, Union Pacific Railroad Company brought suit against Reilly Industries, whose corporate predecessor had leased land from Union Pacific to operate a creosoting plant. *Id.* at 832. Environmental testing later revealed that the soil and groundwater at the site were contaminated. *Ibid.* Union Pacific commenced remediation efforts and enrolled the site in the Minnesota Pollution Control Agency's Voluntary Investigation and Cleanup Program. *Ibid.* State regulators established the cleanup parameters for the site, approved the cleanup plan and the backfilling of the treated soil, confirmed that the

cleanup goal had been reached, and approved the remedial action implementation report. *Id*. at 833.

Union Pacific sought recovery of its cleanup costs from Reilly under CERCLA. *Id*. at 833–834. Reilly obtained summary judgment because the remediation did not substantially comply with two aspects of the NCP: (i) public participation, and (ii) a feasibility study. *Id*. at 834–835. The latter is the same component of the NCP at issue in the current case.

On appeal, Union Pacific relied on *Bedford* to argue that the State's involvement in developing a response plan established substantial compliance with the public-participation requirement. *Id*. at 836 (citing *Bedford*, 156 F.3d at 428). The Eighth Circuit "disagree[d]." *Id*. at 836, 841. It nevertheless acknowledged the split with the Second Circuit but attempted to distinguish *Bedford* on the basis that "none of the parties to the action disputed the quality or cost of the cleanup efforts." *Id*. at 838. That distinction makes little sense; every cost-recovery defendant who challenges compliance with the NCP necessarily disputes the "quality or cost of the cleanup efforts"—usually, as in *Bedford*, *Union Pacific*, and the current case, for being too expensive. Cost-effectiveness is one of the goals of the NCP for which States review cleanup proposals. In the Eighth Circuit, that review does not have the same effect that it does elsewhere.

3. The Tenth Circuit has considered the question presented at least twice, holding both times that State review and approval is insufficient to estab-

lish substantial compliance with the NCP. See *Pub. Serv. Co. of Colorado* v. *Gates Rubber Co.*, 175 F.3d 1177 (10th Cir. 1999); *Morrison Enters.* v. *McShares, Inc.*, 302 F.3d 1127 (10th Cir. 2002).

a. In *Gates*, the plaintiff negotiated cleanup parameters with the Colorado Department of Health ("CDH") and entered into a consent order setting out "the work CDH expected [the plaintiff] to perform, particularly to ensure the proper management of waste stockpiles and to continue soil and water sampling to track levels of contamination." 175 F.3d at 1180. CDH also ordered the plaintiff "to submit monthly progress reports and a final report documenting all soil removal activities." *Ibid.* After completing the cleanup, the plaintiff sued to recover its costs under CERCLA. The defendants obtained summary judgment because the district court ruled that the plaintiff "did not substantially comply with the NCP." *Ibid.*

On appeal, the plaintiff contended that its cleanup was governed by CDH's Consent Order and therefore "should be *presumed* to be consistent with the NCP." *Id.* at 1183. The Tenth Circuit acknowledged that this "contention has precedent," *id.* (citing *Bedford*, 156 F.3d at 428), but held that it "rings hollow" because Colorado's requirements "do not fully mirror those of the NCP," *id.* at 1184. Of course, some amount of incongruity exists between every State's rules and those EPA has promulgated. That is the point of substantial compliance. Nevertheless, the Tenth Circuit broke with *Bedford* and re-

jected the plaintiff's effort to "equat[e] the State's involvement with substantial compliance with the NCP." *Id.* at 1185.

b. The Tenth Circuit considered the same issue in *Morrison* three years later. There, the plaintiff cleaned a contaminated site pursuant to a consent order with the Kansas Department of Health and Environment. 302 F.3d at 1130. Under the consent order, the plaintiff was to "develop a workplan describing its future activities on the site, a comprehensive investigation report describing the results of its investigation of the contamination on the site, and a corrective action study proposing activities to address the contamination," all of which were subject to the agency's approval. *Ibid.* At the same time the plaintiff was engaging in the cleanup, the EPA developed a "state deferral pilot program" in Kansas through which the EPA oversaw certain cleanups, including the plaintiff's, to ensure they were "in compliance with various requirements of federal law." *Id.* at 1131.

In the ensuing cost-recovery action, the defendant obtained summary judgment because the plaintiff failed to establish "compliance with the National Contingency Plan." *Ibid.* On appeal, the plaintiff contended "that it is entitled to a presumption that its cleanup actions were consistent with the NCP because those actions were conducted pursuant to a consent order with the [Kansas Department of Health and Environment]." *Id.* at 1137.

The Tenth Circuit observed that "a presumption does exist for compliance with the NCP where the private party has complied with the EPA orders." *Ibid.* But because the plaintiff "did not comply directly with the EPA orders, but rather with orders from a state agency," the "formal conditions necessary for the regulatory presumptions established by the EPA have not been met, although at least one other court has concluded that compliance with state agency orders is sufficient to establish compliance with the NCP." *Ibid.* (citing *NutraSweet*, 227 F.3d at 791).

While the Tenth Circuit recognized the split of authority and rejected the Seventh Circuit's holding in *NutraSweet*—under which State approval would alone have been sufficient to find substantial compliance with the NCP—it ultimately held that the plaintiff was entitled to a presumption of compliance with the NCP because of "the specifics of the EPA pilot program in this case." *Id.* at 1138. That holding underscores the distinction animating decisions on this side of the split: EPA approval constitutes substantial compliance with the NCP, while State approval does not.

4. Finally, the Ninth Circuit has confronted the question presented at least three times, reaching a different decision in each instance. See *Carson Harbor Vill.* v. *County of Los Angeles*, 433 F.3d 1260 (9th Cir. 2006); *Santa Clarita Valley Water Agency* v. *Whittaker Corp.*, 99 F.4th 458 (2024); App. 1a.

a. In *Carson Harbor*, the plaintiff owned a mobile home park, where it discovered tar-like material that contained high levels of lead. 433 F.3d at 1262. The

plaintiff submitted a "remedial action plan" to the Regional Water Quality Control Board, which modified and ultimately approved the plan. *Ibid.* After excavating more than 1,000 tons of material, the property owner submitted a report to the Board, which inspected the site, approved the cleanup, and issued a "no further action" letter. *Id.* at 1264.

The property owner sued several defendants seeking to recover its cleanup costs under CERCLA. The defendants moved for summary judgment, contending that the plaintiff's cleanup did not substantially comply with the NCP, specifically, the "public participation and feasibility study requirements." *Id.* at 1265.

On appeal, the plaintiff contended that it established compliance with the NCP "because of the 'substantial involvement'" of the State regulator. *Id.* at 1266. The Ninth Circuit acknowledged that "[s]everal other courts . . . have held that 'participation by a public agency is sufficient to demonstrate compliance with the National Contingency Plan public comment requirement.'" *Ibid.* However, the Ninth Circuit determined that it "need not decide that issue of first impression" because the Board's involvement was allegedly too minor to establish substantial compliance, "[e]ven if significant agency involvement were enough." *Id.*

b. In *Santa Clarita Valley Water Agency*, the Ninth Circuit partially answered the question it left open in *Carson Harbor*. There, a public water agency sued Whitaker Corporation, a munitions manufacturing company, along with several other PRPs

that had improperly disposed of hazardous chemicals for decades. 99 F.4th at 466–467. Those pollutants permeated the soil and groundwater, which contaminated an aquifer from which the agency sourced water via four wells. *Id.* at 467–469. For three of the wells, it had to purchase clean water to dilute the polluted water until the "blend" water met applicable standards; it had to close the fourth well entirely and purchase replacement water from the State Water Project. *Ibid.*

In the CERCLA cost-recovery suit, the district court held that Whitaker was not liable for the agency's "replacement water" and "blend water" responses because "it did not establish that it substantially complied with the National Contingency Plan"—specifically, the NCP's public participation requirement. *Id.* at 469–470, 478.

On appeal, the Ninth Circuit reversed the district court and held the agency's "blend water" response substantially complied by virtue of the State's substantial oversight. *Id.* at 480. That holding was narrow as a matter of law and fact. On the law, the Ninth Circuit acknowledged that "some courts have indicated that extensive government oversight of the response actions may satisfy the public participation requirement." *Id.* at 479 (citing *Bedford*). It did not mention the decisions holding that State oversight and approval establishes compliance with the NCP as a whole. It embraced only the former implication of State approval. On the facts, *Santa Clarita* held that "the specific facts of

this case," showed sufficient government involvement on the "blend water" response but not on the "replacement water" response. *Id*. at 481–482.

c. This case raised the issue for a third time. Moreland cited *NutraSweet*, *Bedford*, and *Bangor* in arguing that the Ninth Circuit should reverse the district court and fully join the circuits "treating state oversight and approval as establishing substantial compliance with the NCP." CA9 Appellant's Br. 64; see also *id*. at 56–64, CA9 Reply Br. 27–31. Unlike *Santa Clarita*, which involved only the NCP's public-participation requirement, Goodyear also contended that Moreland's cleanup did not substantially comply with the NCP because, *inter alia*, Moreland did not conduct an additional feasibility study. The district court entered judgment for defendants on the basis that these shortcomings foreclosed substantial compliance. App. 42a–48a; *see supra* 11–12.

The Ninth Circuit did not address Moreland's arguments or those raised in the circuit decisions on the other side of the split. Nor did it endorse the reasoning of the district court, which relied on a counterfactual assumption that, even if correct, did not answer the question of whether ADEQ oversaw, reviewed, and approved Moreland's cleanup. Instead, the Ninth Circuit let silence do the work. Without acknowledging the parties' briefing and divergent circuit decisions, the panel proceeded to evaluate whether Moreland's response substantially complied with the NCP. App. 8a–10a. That inquiry

would not have occurred in the three circuits that recognize State review and approval as establishing substantial compliance.

At the end of the day, the Ninth Circuit's position further complicates the circuit split. It deems a private party's State-approved cleanup substantially compliant with the NCP's public-participation requirement, but it holds that State oversight does ***not*** suffice for substantial compliance with the NCP's other requirements. Nothing in CERCLA suggests that States' supervisory powers differ across components of the NCP. Nor does CERCLA suggest that State-approved cleanups should be treated any differently than cleanups undertaken by the State itself, which are presumed substantially compliant with the NCP. The Ninth Circuit's selective embrace of State approvals for the NCP's public-participation requirement highlights the lower courts' confusion on the effect that a State's oversight has on judicial review of substantial compliance with the NCP.

* * *

Seven circuits have now weighed in on the question presented in this case. Three of them—the Eighth, Ninth (in *Carson Harbor*), and Tenth—have acknowledged the split, as have district courts in other circuits that have yet to take a side. For instance, the Southern District of Texas recently observed that "[t]he Second and Seventh Circuits have held that extensive state involvement is dispositive evidence of a response action's compliance with the

Plan." *Exxon Mobil Corp. v. United States*, 335 F. Supp. 3d 889, 919 (S.D. Tex. 2018) (citation omitted). And, although the Fifth Circuit has not weighed in on the question, the district court opted to follow *Niagara Mohawk* and *NutraSweet*: "The undisputed record evidence shows that Texas and Louisiana were extensively involved in Exxon's cleanup response activities at the two facilities, establishing compliance with the National Contingency Plan, as a matter of law." *Ibid.*

The division on this issue is both entrenched and acknowledged. Only guidance from this Court can resolve whether State review and approval of private parties' response actions presumptively establishes substantial compliance with the NCP. The Court should grant the petition and resolve the split.

II. This Case Is an Ideal Vehicle for Resolving the Split.

A private party pursuing a CERCLA cost-recovery action must satisfy four elements. See, *e.g., City of Colton.* v. *Am. Promotional Events, Inc. W.*, 614 F.3d 998, 1002–1003 (9th Cir. 2010). Here, the district court resolved three of those elements in Moreland's favor. App. 37a–39a. Goodyear did not appeal those holdings. Thus, the sole element at issue is whether Moreland's cleanup substantially complied with the National Contingency Plan. *Ibid.* Under Ninth Circuit precedent, it does not, so the panel proceeded to examine substantial compliance

(and found it lacking based on Moreland's and ADEQ's reliance on older feasibility studies). The question whether State approval establishes substantial compliance is therefore squarely presented.

Moreover, the question is a strictly legal one. Its application to the facts of this case might require remand to the Ninth Circuit, which said nothing on the topic, but that does not impair this Court's ability to resolve the split. Indeed, the circuit court's silence makes the legal question all the tidier. On remand, the Ninth Circuit can evaluate whether the district court was correct to hold that Arizona's administrative settlement program did not entail State oversight, contrary to testimony from ADEQ's Division Director that "[t]here's a lot of oversight in the Administrative Settlement." App. 101a. That debate need not, however, detain this Court. The legal question is whether, in light of the vital role States play in implementing CERCLA and the many statutory provisions giving effect to State regulations, State oversight and approval is enough to establish substantial compliance. That issue has divided the circuits, and it is the only question presented for this Court's review.

III. States' Ability to Establish Substantial Compliance Is an Issue of Structural Importance.

Not only does CERCLA address the important issue of environmental remediation, but it embodies the federalism at the heart of American govern-

ment. It does so as a matter of necessity, a point that courts and the EPA itself have made for decades. Without a presumption that State approvals establish substantial compliance with the NCP, landowners lose an incentive to work with the States and, with it, an incentive to take any action at all.

This Court and others have noted the "spirit of cooperative federalism" that permeates CERCLA and its regulations. *Atl. Richfield*, 590 U.S. at 24. That approach is not only principled, but inevitable. "EPA plays a regulatory oversight role at only a relative handful of the nation's many thousands of sites. At most sites, state or local government agencies serve as the lead regulatory entity." Ronald G. Aronovsky, *Federalism and CERCLA: Rethinking the Role of Federal Law in Private Cleanup Cost Disputes*, 33 Ecology L.Q. 1, 7–8 (2006). Because of the large number of sites to be remediated and EPA's limited resources, "Congress clearly expressed its intent that CERCLA should work in conjunction with other federal and state hazardous waste laws in order to solve this country's hazardous waste cleanup problem." *New Mexico v. Gen. Elec. Co.*, 467 F.3d 1223, 1244 (10th Cir. 2006) (citation omitted).

Congress included a cost-recovery action to encourage private parties to "assume the financial responsibility of cleanup" by allowing them "to seek recovery from others." *Key Tronic Corp. v. United States*, 511 U.S. 809, 819 n.13 (1994). That incen-

tive vanishes if the property's previous owner can do what Goodyear has done here: fraudulently claim that it already cleaned the soil, sit quietly by while the new owner works with the State to complete remediation, and then review the cleanup with a fine-toothed comb in search of departures from the daedal NCP. If that strategy is fruitful, it destroys both of CERCLA's purposes that the Court recognized in *Burlington Northern*: (i) encouraging a prompt cleanup (ii) at the polluter's expense. 556 U.S. at 602. No rational property owner will undertake a cleanup if even compliance with State regulators' directions does not assure that courts will not later second-guess compliance with the NCP. They would be better served to do nothing and wait for a governmental agency to carry out the response. That undermines the promptness objective.

Even more obviously, Goodyear's strategy allows polluters to escape the cost of a cleanup. That strategy begins with refusal to conduct the response itself. See 40 C.F.R. § 300.415(a)(2) ("Where the responsible parties are known, an effort initially shall be made, to the extent practicable, to determine whether they can and will perform the necessary removal action promptly and properly."). Step two is to scrutinize the completed cleanup and invest in litigation rather than remediation. Goodyear's approach here is illustrative. It disputed all four elements of the prima facie case for cost recovery, launching theories as creative as a third party trespassing on the property and depositing arsenic. The district court rejected all of them, save the substan-

tial-compliance point, which is unsurprising given the NCP's complexity. App. 37a–39a (rejecting other arguments). Under the Ninth Circuit's approach, the reward for Goodyear's combination of denial and hindsight is saddling Moreland with the entire cost of cleaning Goodyear's pollution.

That outcome destroys the incentives that are essential to cleaning more sites than EPA could ever remediate alone. As EPA explained in its amicus brief in *Niagara Mohawk*, "[i]t is important that [property owners] that agree to engage in response activities in settlements with states have appropriate CERCLA claims for contribution against other PRPs. Otherwise, PRPs will decline to enter into administrative settlements . . . ." U.S. Br., *Niagara Mohawk*, 2008 WL 10610074, at *2. That approach "creates perverse incentives for private parties to refuse to settle with state environmental agencies and undertake cleanup activities." *Ibid.*

CERCLA's effective operation depends on the States. If they lack the ability to impart a presumption of substantial compliance with the NCP, the incentives shift toward inaction, and the only winners are polluters who can defer compensation until EPA or a State agency carries out the cleanup themselves.

CONCLUSION

The Court should grant the petition to bring clarity on an issue that has created an acknowledged division among the circuit courts. And, as EPA recognized in the Second Circuit, that division discourages property owners from entering administrative settlements with the States, resulting in pollution remaining in the ground as a result of legal uncertainty. That is the opposite effect that Congress intended CERCLA to have. The Court should grant the petition, restore CERCLA's focus on cooperative federalism and, in the process, revive the incentives for private cleanups.

Respectfully submitted.

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December 22, 2025

APPENDIX

TABLE OF APPENDICES

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APPENDIX A — ORDER AND MEMORANDUM OF THE UNITED STATES COURT OF APPEALS FOR THE NINTH CIRCUIT, FILED AUGUST 26, 2025

UNITED STATES COURT OF APPEALS
FOR THE NINTH CIRCUIT

No. 24-2451

D.C. No. 2:20-cv-02297-SRB
District of Arizona, Phoenix

MORELAND PROPERTIES LLC, A COLORADO LIMITED LIABILITY COMPANY,

Plaintiff-Appellant,

v.

GOODYEAR TIRE & RUBBER COMPANY, NAMED AS THE GOODYEAR TIRE & RUBBER COMPANY, AN OHIO CORPORATION AND GOODYEAR FARMS INCORPORATED, AN ARIZONA CORPORATION,

Defendants-Appellees.

ORDER

Before: GRABER, BERZON, and BENNETT, Circuit Judges.

The memorandum disposition filed on June 12, 2025, is withdrawn. A replacement memorandum disposition and a partial dissent by Judge Graber will be filed concurrently with this order.

With these amendments, the panel has unanimously voted to deny Appellant's petition for rehearing. Judge Bennett has voted to deny the petition for rehearing en banc, and Judge Berzon and Judge Graber have so recommended. The full court has been advised of the petition for rehearing en banc, and no judge has requested a vote on whether to rehear the matter en banc. Fed. R. App. P. 40. The petition for rehearing en banc is denied. No additional petitions for rehearing may be filed.

Appendix A

UNITED STATES COURT OF APPEALS
FOR THE NINTH CIRCUIT

No. 24-2451

D.C. No. 2:20-cv-02297-SRB

MORELAND PROPERTIES LLC, A COLORADO LIMITED LIABILITY COMPANY,

Plaintiff-Appellant,

v.

GOODYEAR TIRE & RUBBER COMPANY, NAMED AS THE GOODYEAR TIRE & RUBBER COMPANY, AN OHIO CORPORATION; GOODYEAR FARMS INCORPORATED, AN ARIZONA CORPORATION,

Defendants-Appellees.

Appeal from the United States
District Court for the District of Arizona
Susan R. Bolton, District Judge, Presiding

Argued and Submitted March 26, 2025
Submission Withdrawn April 8, 2025
Resubmitted June 10, 2025
Phoenix, Arizona

MEMORANDUM[*]

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* This disposition is not appropriate for publication and is not precedent except as provided by Ninth Circuit Rule 36-3.

Appendix A

Before: GRABER, BERZON, and BENNETT, Circuit Judges.

Partial Concurrence and Partial Dissent by Judge GRABER.

Plaintiff Moreland Properties, LLC ("Moreland") appeals (1) the district court's grant of summary judgment for Defendants Goodyear Farms, Inc. and the Goodyear Tire and Rubber Company (collectively, "Goodyear") on Moreland's fraud claim and (2) the district court's judgment for Goodyear following a bench trial on Moreland's Comprehensive Environmental Response, Compensation, and Liability Act ("CERCLA") claim. We affirm on both issues.

1. The district court correctly concluded that Moreland's fraud claim was time barred. Arizona applies a three-year limitations period to fraud claims. Ariz. Rev. Stat. § 12-543(3). The statute of limitations does not begin to run "until the discovery by the aggrieved party of the facts constituting the fraud or mistake." *Id.* Discovery occurs at the point "when the defrauded party discovers or with reasonable diligence could have discovered the fraud." *Mister Donut of Am., Inc. v. Harris*, 150 Ariz. 321, 723 P.2d 670, 672 (Ariz. 1986). Because a claim accrues when a reasonably diligent party would have discovered it, this discovery rule includes a corollary "duty to investigate." *Doe v. Roe*, 191 Ariz. 313, 955 P.2d 951, 962 (Ariz. 1998); *Walk v. Ring*, 202 Ariz. 310, 44 P.3d 990, 994 (Ariz. 2002). As a result, the statute of limitations "may begin to run before a person has actual knowledge of the fraud or even

all the underlying details of the alleged fraud." *Mister Donut*, 723 P.2d at 672; *see also Coronado Dev. Corp. v. Superior Ct. of Ariz. ex rel. County of Cochise*, 139 Ariz. 350, 678 P.2d 535, 537 (Ariz. Ct. App. 1984).

The report from Western Technologies Inc. ("WTI") in January 2015 showed an average arsenic concentration of around 50 mg/kg. Goodyear's 2004 Declaration of Environmental Use Restriction ("DEUR") had reported a 95% upper confidence limit mean arsenic concentration of only 10 mg/kg. The WTI report's findings were sufficiently alarming that the prospective buyer to whom Moreland had intended to sell the land withdrew from the sale, and Moreland initiated remediation efforts. Further, William Moreland testified that he understood the WTI report to mean that "the property is not as stated in the DEUR" and that, as a result, "I couldn't sell it saying there's a DEUR as I bought it. And this DEUR is misrepresented or it's fraudulent. I couldn't do it." The WTI report therefore put a reasonable person on notice that fraud may have occurred and that an investigation was called for.

That scienter is one of the facts constituting fraud, *see Merck & Co. v. Reynolds*, 559 U.S. 633, 648-49, 130 S. Ct. 1784, 176 L. Ed. 2d 582 (2010), does not affect the date at which a reasonably diligent plaintiff in Moreland's position would have begun investigating. The WTI report's finding of extremely elevated arsenic levels was sufficient to put a reasonable person on notice to investigate whether Goodyear misrepresented the concentrations in the DEUR and, if so, whether it did so knowingly, even though the report did not address those issues.

When Moreland did investigate the reason for the inconsistency between its sampling and the DEUR, it took approximately one month for it to discover that Goodyear allegedly had not "take[n] sufficient pre-and post-confirmation arsenic samples" to "delineate, confirm, or further excavate the areas of arsenic impacted soil," even though it was required to do so by the work plan approved by the Arizona Department of Environmental Quality ("ADEQ"). It is these findings on which Moreland relied to allege both the falsity of the DEUR and scienter. Had Moreland acted as a reasonably diligent plaintiff would have and begun investigating the basis for the arsenic inconsistency after receiving the WTI report, it would have discovered the facts constituting fraud—including those suggesting scienter—in early 2015. Because Moreland filed suit on November 30, 2020, more than three years later, its fraud claim is barred by the statute of limitations.

2. The district court correctly found for Goodyear on Moreland's CERCLA claim. To recover, Moreland had to show that its response action was "consistent with" the National Contingency Plan ("NCP"). *Carson Harbor Vill., Ltd. v. County of Los Angeles*, 433 F.3d 1260, 1265 (9th Cir. 2006); *see* 42 U.S.C. § 9607(a)(4)(B). "A private party response action will be considered 'consistent with the NCP' if the action, when evaluated as a whole, is in substantial compliance with the applicable requirements. . . ." 40 C.F.R. § 300.700(c)(3)(i).

A. "CERCLA and the National Contingency Plan divide response actions into two broad categories: removal

actions and remedial actions." *United States v. W.R. Grace & Co.*, 429 F.3d 1224, 1227 (9th Cir. 2005); *see also* 42 U.S.C. § 9601(23), (24). "[B]oth types of actions have substantial requirements, but the [NCP's] requirements for remedial actions are much more detailed and onerous." *W.R. Grace*, 429 F.3d at 1228 (citation omitted). "[R]emoval actions encompass interim, partial time-sensitive responses taken to counter serious threats to public health." *Id.* at 1245; *see also Santa Clarita Valley Water Agency v. Whittaker Corp.*, 99 F.4th 458, 478 (9th Cir. 2024). "Remedial actions, on the other hand, are often described as permanent remedies to threats for which an urgent response is not warranted." *W.R. Grace*, 429 F.3d at 1228 (footnote omitted); *see also Santa Clarita*, 99 F.4th at 478.

The district court properly characterized Moreland's response as a remedial action. Moreland's response did not address a time-sensitive public health threat, because there was "no evidence that the elevated arsenic or toxaphene concentrations in the soil required 'immediate attention.'" The only evidence of risk Moreland provided was that the degree of arsenic contamination on the land exceeded the applicable Arizona Soil Remediation Level ("SRL") set by ADEQ; Moreland presented no evidence that the risk was time-sensitive or substantial enough to necessitate an immediate response. That the land was a vacant, undeveloped lot suggests there was minimal risk that someone would come into contact with the contaminated soil, and there was evidence introduced at trial that the soil presented no risk of groundwater contamination.

Moreland's response was also "comprehensive" and "permanent," not "interim" or "partial." *W.R. Grace*, 429 F.3d at 1228, 1245. By Moreland's own estimation, the excavation reduced the soil's arsenic concentration to 9.9 mg/kg and the toxaphene concentration to 4.9 mg/kg. These values are below the current residential SRLs, indicating that Moreland's response "fully eliminate[d] the public health threat" posed by the contamination. *Id.* at 1247.

That Moreland's ADEQ-approved work plan referred to the response as a "removal" is not pertinent. An ADEQ employee explained during trial that ADEQ's approval of Moreland's work plan involved no substantive determination that Moreland's response was a removal action under CERCLA, nor would ADEQ's interpretation of CERCLA be entitled to deference. *See Arizona v. City of Tucson*, 761 F.3d 1005, 1014 (9th Cir. 2014).

Accordingly, Moreland's response is properly characterized as a remedial action.

B. Because Moreland's response was a remedial action, the NCP required, among other things, that Moreland conduct a feasibility study containing "[a] detailed analysis" of "alternatives that represent viable approaches to remedial action." 40 C.F.R. § 300.430(e)(9)(i). "One of the hallmarks of the feasibility study requirement is assessing a variety of possible alternatives and providing analysis of the costs, implementability, and effectiveness of each, and choosing the best alternative for the site at issue." *Carson Harbor*, 433 F.3d at 1268; *see*

also 40 C.F.R. § 300.430(e)(9)(iii) (listing criteria that the feasibility study must consider).

Moreland has submitted no evidence to show that it conducted the required feasibility study or otherwise analyzed remedial alternatives. Its work plan considered only excavation. Its 2017 sampling report likewise did not assess any remedial alternatives. Although the WTI report noted that "[l]ess expensive remediation/mitigation alternatives are potentially available," it did not list those alternatives, or analyze the costs, effectiveness, or other features of such alternatives, aside from stating that they "often involve increased agency interaction and frequently less certainty in the schedule for the project." Because "discussing a single remediation alternative does not establish substantial compliance with the feasibility study requirements of the National Contingency Plan," these documents do not suffice. *Carson Harbor*, 433 F.3d at 1268. The feasibility studies Marsh Aviation commissioned in the 1990s do not satisfy the NCP's requirement, as they addressed only the toxaphene contamination; no remedial options to resolve the arsenic contamination at issue in Moreland's remediation were discussed. Further, because the studies were conducted before Goodyear's remediation attempt, they did not accurately characterize the scope of the contamination Moreland confronted or the relative merits of various remedial options available to Moreland.

In sum, Moreland did not substantially comply with the feasibility study requirement, so its remediation was inconsistent with the NCP. Because Moreland is barred from recovering on that ground, we do not consider

whether Moreland complied with the NCP's public participation requirement or whether its response costs were necessary.

AFFIRMED.

GRABER, Circuit Judge, concurring in part and dissenting in part:

I agree with the disposition's analysis of the federal claim, and I join that part entirely. But I respectfully disagree with the disposition's analysis of the state-law fraud claim. I would hold that, construing the facts in the light most favorable to Plaintiff, as we must, a reasonable juror could decide that the 2015 report did not trigger an immediate duty to investigate whether Defendant had committed *fraud*. *See Walk v. Ring*, 202 Ariz. 310, 44 P.3d 990, 995 (Ariz. 2002) (holding that a reasonable juror could conclude that no immediate duty to investigate a dentist's negligence arose from severe pain following a dental procedure); *see also Satamian v. Great Divide Ins.*, 257 Ariz. 163, 545 P.3d 918, 926 (Ariz. 2024) (holding that the date of discovery may vary depending on the specific cause of action). I therefore would reverse the summary judgment and remand for further proceedings on the state-law claim.

APPENDIX B — MEMORANDUM OF THE UNITED STATES COURT OF APPEALS FOR THE NINTH CIRCUIT, FILED JUNE 12, 2025

UNITED STATES COURT OF APPEALS
FOR THE NINTH CIRCUIT

No. 24-2451

D.C. No. 2:20-cv-02297-SRB

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v.

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Appendix B

MEMORANDUM*

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1. The district court correctly concluded that Moreland's fraud claim was time barred. Arizona applies a three-year limitations period to fraud claims. Ariz. Rev. Stat. § 12-543(3). The statute of limitations does not begin to run "until the discovery by the aggrieved party of the facts constituting the fraud or mistake." *Id.* Discovery occurs at the point "when the defrauded party discovers or with reasonable diligence could have discovered the fraud." *Mister Donut of Am., Inc. v. Harris*, 150 Ariz. 321, 723 P.2d 670, 672 (Ariz. 1986). Because a claim accrues when a reasonably diligent party would have discovered it, this discovery rule includes a corollary "duty to investigate." *Doe v. Roe*, 191 Ariz. 313, 955 P.2d 951, 962 (Ariz. 1998); *Walk v. Ring*, 202 Ariz. 310, 44 P.3d 990, 994 (Ariz. 2002).

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2. The district court correctly found for Goodyear on Moreland's CERCLA claim. To recover, Moreland had to show that its response action was "consistent with" the National Contingency Plan ("NCP"). *Carson Harbor Vill., Ltd. v. County of Los Angeles*, 433 F.3d 1260, 1265 (9th Cir. 2006); *see* 42 U.S.C. § 9607(a)(4)(B). "A private party response action will be considered 'consistent with the NCP' if the action, when evaluated as a whole, is in substantial compliance with the applicable requirements . . . ." 40 C.F.R. § 300.700(c)(3)(i).

Appendix B

A. "CERCLA and the National Contingency Plan divide response actions into two broad categories: removal actions and remedial actions." *United States v. W.R. Grace & Co.*, 429 F.3d 1224, 1227 (9th Cir. 2005); *see also* 42 U.S.C. § 9601(23), (24). "[B]oth types of actions have substantial requirements, but the [NCP's] requirements for remedial actions are much more detailed and onerous." *W.R. Grace*, 429 F.3d at 1228 (citation omitted). "[R]emoval actions encompass interim, partial time-sensitive responses taken to counter serious threats to public health." *Id.* at 1245; *see also Santa Clarita Valley Water Agency v. Whittaker Corp.*, 99 F.4th 458, 478 (9th Cir. 2024). "Remedial actions, on the other hand, are often described as permanent remedies to threats for which an urgent response is not warranted." *W.R. Grace*, 429 F.3d at 1228 (footnote omitted); *see also Santa Clarita*, 99 F.4th at 478.

The district court properly characterized Moreland's response as a remedial action. Moreland's response did not address a time-sensitive public health threat, because there was "no evidence that the elevated arsenic or toxaphene concentrations in the soil required 'immediate attention.'" The only evidence of risk Moreland provided was that the degree of arsenic contamination on the land exceeded the applicable Arizona Soil Remediation Level ("SRL") set by ADEQ; Moreland presented no evidence that the risk was time-sensitive or substantial enough to necessitate an immediate response. That the land was a vacant, undeveloped lot suggests there was minimal risk that someone would come into contact with the contaminated soil, and there was evidence introduced at trial that the soil presented no risk of groundwater contamination.

Moreland's response was also "comprehensive" and "permanent," not "interim" or "partial." *W.R. Grace*, 429 F.3d at 1228, 1245. By Moreland's own estimation, the excavation reduced the soil's arsenic concentration to 9.9 mg/kg and the toxaphene concentration to 4.9 mg/kg. These values are below the current residential SRLs, indicating that Moreland's response "fully eliminate[d] the public health threat" posed by the contamination. *Id.* at 1247.

That Moreland's ADEQ-approved work plan referred to the response as a "removal" is not pertinent. An ADEQ employee explained during trial that ADEQ's approval of Moreland's work plan involved no substantive determination that Moreland's response was a removal action under CERCLA, nor would ADEQ's interpretation of CERCLA be entitled to deference. *See Arizona v. City of Tucson*, 761 F.3d 1005, 1014 (9th Cir. 2014).

Accordingly, Moreland's response is properly characterized as a remedial action.

B. Because Moreland's response was a remedial action, the NCP required, among other things, that Moreland conduct a feasibility study containing "[a] detailed analysis" of "alternatives that represent viable approaches to remedial action." 40 C.F.R. § 300.430(e)(9)(i). "One of the hallmarks of the feasibility study requirement is assessing a variety of possible alternatives and providing analysis of the costs, implementability, and effectiveness of each, and choosing the best alternative for the site at issue." *Carson Harbor*, 433 F.3d at 1268; *see*

also 40 C.F.R. § 300.430(e)(9)(iii) (listing criteria that the feasibility study must consider).

Moreland has submitted no evidence to show that it conducted the required feasibility study or otherwise analyzed remedial alternatives. Its work plan considered only excavation. Its 2017 sampling report likewise did not assess any remedial alternatives. Although the WTI report noted that "[l]ess expensive remediation/mitigation alternatives are potentially available," it did not list those alternatives, or analyze the costs, effectiveness, or other features of such alternatives, aside from stating that they "often involve increased agency interaction and frequently less certainty in the schedule for the project." Because "discussing a single remediation alternative does not establish substantial compliance with the feasibility study requirements of the National Contingency Plan," these documents do not suffice. *Carson Harbor*, 433 F.3d at 1268. The feasibility studies Marsh Aviation commissioned in the 1990s do not satisfy the NCP's requirement, as they addressed only the toxaphene contamination; no remedial options to resolve the arsenic contamination at issue in Moreland's remediation were discussed. Further, because the studies were conducted before Goodyear's remediation attempt, they did not accurately characterize the scope of the contamination Moreland confronted or the relative merits of various remedial options available to Moreland.

In sum, Moreland did not substantially comply with the feasibility study requirement, so its remediation was inconsistent with the NCP. Because Moreland is barred from recovering on that ground, we do not consider

whether Moreland complied with the NCP's public participation requirement or whether its response costs were necessary.

AFFIRMED.

APPENDIX C — FINDINGS OF FACT AND CONCLUSIONS OF LAW OF THE UNITED STATES DISTRICT COURT FOR THE DISTRICT OF ARIZONA, FILED JULY 27, 2023

IN THE UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF ARIZONA

No. CV-20-02297-PHX-SRB

MORELAND PROPERTIES LLC,

Plaintiff,

v.

GOODYEAR TIRE & RUBBER COMPANY, *et al.*,

Defendants.

FINDINGS OF FACT AND CONCLUSIONS OF LAW

This case arises out of a Comprehensive Environmental Response, Compensation, and Liability Act ("CERCLA") claim by Plaintiff Moreland Properties, LLC ("Moreland") for costs Moreland incurred by excavating arsenic-contaminated soil at property formerly owned by Defendants Goodyear Tire & Rubber Company and Goodyear Farms, Inc. (collectively, "Goodyear"). The Court conducted a ten-day bench trial on Moreland's CERCLA and breach of implied covenant of good faith and fair dealing claims, which concluded on May 10, 2023. (*See* Docs. 142, 143, 145, 149, 162, 167, 169, 174, 181, 182, Min. Entries.) Having considered the evidence received at trial

as well as the arguments of counsel, the Court makes the followings findings of fact and conclusions of law.

I. FINDINGS OF FACT[1]

A. Goodyear's Ownership and Remediation of the Goodyear Property

From 1974 through 1988, Goodyear leased a large parcel of land on the northwest corner of McDowell Road and 159th Avenue in Maricopa County, Arizona ("Goodyear Property") to Marsh Aviation Co. ("Marsh"). Marsh used the Goodyear Property to mix, store, and load chemicals for its crop-dusting operation. The Goodyear Property included an area known as the Operations Area, which contained a pesticide mixing and storage zone, waste burn areas, and an aircraft hangar and fueling facility. (*See* Ex. 5, ("Summary Report Vol. 1") at MOR00011.) In 1986, Goodyear sold almost all of its real estate surrounding the Goodyear Property to SunCor Development Company, Inc. ("SunCor"), and sold SunCor an option to purchase the Goodyear Property.

Marsh's crop-dusting operation caused the release of environmental contaminants onto the Goodyear Property, including toxaphene and arsenic. Toxaphene was widely used as a pesticide until the Environmental Protection Agency ("EPA") banned its use in the 1980s, and arsenic

1. Portions of the Court's findings of fact have been adopted from the Joint Proposed Pretrial Order, as well as Moreland's and Goodyear's respective Proposed Findings of Fact and Conclusions of Law, without separate citation. (*See* Docs. 130, 131, 141.)

is a heavy metal commonly used as a plant defoliant. Both are hazardous substances under CERCLA. 42 U.S.C. § 9601(14), 40 C.F.R. § 302.4. According to Dr. Stephen Speyer, human receptors for arsenic include contact with the skin, ingestion, and inhalation. (Stephen Speyer Trial Tr. ("Speyer Tr.") 159:13-17.) In May 1988, the Arizona Department of Environmental Quality ("ADEQ") issued a Compliance Order that required Marsh to remediate the Goodyear Property to remove chemicals deemed dangerous to human health and the environment. Goodyear retook possession of the Goodyear Property after Marsh became insolvent and worked with ADEQ from 1999 to 2004 to complete the remediation.[2]

1. Goodyear's Remediation of the Goodyear Property

Ogden Environmental ("Ogden") drafted a Site Assessment Plan ("SAP") on behalf of Goodyear, which proposed to analyze the extent of toxaphene contamination in the soil at the Goodyear Property. (Ex. 129, at GOODYEAR00008274, 8281-86.) Ogden updated the SAP to also evaluate arsenic contamination after ADEQ requested Ogden include arsenic as a contaminant of concern at the Goodyear Property. (Ex. 14, at GOODYEAR00004248;

2. By the time Goodyear retook possession of the Goodyear Property, environmental investigations had been performed by several environmental consultant groups. These investigations were primarily focused on remediating toxaphene contamination and did not consider arsenic to be a contaminant of concern. (Ex. 166, ("SAR/CAP") at GOODYEAR00005018-20; *see, e.g.*, Ex. 50, at GOODYEAR00003734 (indicating no need for additional arsenic analysis); Ex. 58; Ex. 59, at GOODYEAR00004057-60 (no discussion of arsenic in its remedial alternatives).)

Ex. 186, at GOODYEAR00004272.) ADEQ approved the SAP. Ogden's soil sampling, limited to the top 18 inches of soil in the Operations Area, revealed arsenic concentrations as high as 801 milligrams per kilogram ("mg/kg") and toxaphene concentrations as high as 1,600 mg/kg. (Ex. 18, GOODYEAR00004628, 4631.)

Goodyear then retained Haley & Aldrich ("H&A"), to draft a Site Assessment Report and Corrective Action Plan ("SAR/CAP"), which, *inter alia*, proposed remediating the Operations Area to meet the non-residential soil remediation levels ("SRLs") for arsenic and toxaphene.[3] (Ex. 18.) ADEQ approved H&A's SAR/CAP in September 2002. (*See* SAR/CAP; Ex. 17; Ex. 187.) The SAR/CAP identified seven distinct areas requiring remediation within the Operations Area to reduce toxaphene and arsenic contamination to non-residential SRLs. (SAR/CAP at GOODYEAR00005027, 5031 (identifying "excavation area[s] 4 through 10").) H&A did not propose to excavate the western third of the Operations Area because pre-excavation soil samples tested below the non-residential SRLs for arsenic and toxaphene. (*Id.* at GOODYEAR00005022-23 (explaining that no remediation was required near the aircraft hangar, fuel storage tank, and parts storage); *see* Ex. 17 at GOODYEAR00000085.)

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3. Arizona requires property owners to meet acceptable SRLs that are protective of human health and the environment. At the time of Goodyear's remediation, Arizona's statutory SRLs for non-residential land uses were 10 mg/kg for arsenic and 17 mg/kg for toxaphene. The SRLs for residential purposes were 10 mg/kg for arsenic and 4 mg/kg for toxaphene. (SAR/CAP at GOODYEAR00005023.)

Appendix C

The SAR/CAP required H&A to take "step-out" samples to "delineate" the lateral extent of contamination where a given sample exceeded the non-residential SRL for toxaphene or arsenic. (SAR/CAP at GOODYEAR00005028-29; 5051 (illustrating pre-excavation sampling procedure).) Before its excavation, H&A tested four "confirmation" soil samples for arsenic, two of which revealed arsenic concentrations above the non-residential SRL. (Ex. 20, Corrective Action Report ("CAR") at GOODYEAR00006125.) But H&A did not take any step-out samples to define the lateral extent of arsenic contamination as required by the SAR/CAP. (*Id.* at GOODYEAR00005753 (explaining that the lateral extent of arsenic contamination at these two locations were each "defined by one pre-excavation confirmation sample"), 6125.) H&A excavated and disposed of 4,100 tons of contaminated soil from the Goodyear Property. The SAR/CAP also required H&A to take post-excavation confirmation samples, including two arsenic samples from the base of the excavations, to verify adequate removal of contaminated soils. (SAR/CAP at GOODYEAR00004979.) But H&A did not take these post-excavation confirmation samples for arsenic. (CAR at GOODYEAR00005753-55, 5768.) Because H&A failed to take step-out samples and post-excavation confirmation samples, it failed to comply with the SAR/CAP's requirements for delineating arsenic contamination across the Operations Area.

Goodyear submitted its Final Corrective Action Report ("CAR") to ADEQ on October 9, 2003, which described Goodyear's remediation of the Goodyear Property. (*See generally id.*) Using its pre-excavation soil sample data that represented soil remaining at the

property after the excavation, H&A calculated the 95 percent upper confidence limit ("95% UCL") mean arsenic concentration for the entire Operations Area to be 10 mg/kg.[4] (*Id.* at GOODYEAR00006125.) ADEQ approved the CAR.

3. The 2004 DEUR

On September 30, 2004, Goodyear executed a Declaration of Environmental Use Restriction, which limited the Operations Area to non-residential uses ("2004 DEUR"). (Ex. 1, ("2004 DEUR") at GOODYEAR00000004, 9.) A DEUR restricts property from being put to residential use because contaminant levels exceed residential SRLs. Goodyear placed the 2004 DEUR over the entire 6.9 acres of Operations Area, even though the arsenic and toxaphene concentrations on the western portion of the property were below the

4. The parties spent multiple days of trial discussing the nuances of 95% UCL calculations and the appropriate methodologies for the parties' respective investigations of the arsenic and toxaphene contamination, but a brief explanation will suffice. The 95% UCL is a statistical measure that estimates the maximum contaminant concentration distributed throughout the represented property, with approximately five percent of randomized samples expected to exceed this value. (*See* Scott Shock Trial Tr. ("Shock Tr.") at 115:4-17.) The 95% UCL should be calculated using sampling data that is "representative" of the site's conditions. This is because data that under-or overrepresents contamination levels across the property will correlate directly to higher or lower 95% UCL calculations. The 95% UCL can be used to assess exposure risks to the contaminant based on exposure pathways. (*See id.* at 54:25-55:2 (explaining that an exposure pathway is the route of exposure between a contaminant and receptor).)

residential SRLs. (*Id.* at GOODYEAR00000009-10; CAR at GOODYEAR00005022-23; Ex. 17 at GOODYEAR00000083, 85.) The 2004 DEUR represented that the 95% UCL concentrations of arsenic and toxaphene remaining across the Operations Area were 10 mg/kg and 13 mg/kg, respectively. (2004 DEUR at GOODYEAR00000012.)

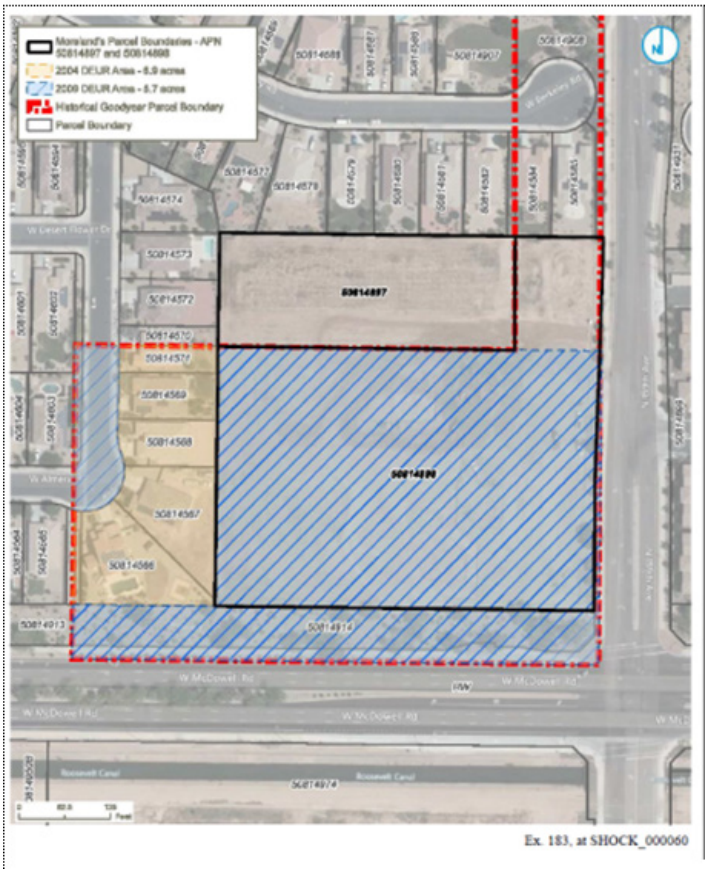
In 2004, SunCor exercised its option to purchase the Goodyear Property and divided the Operations Area into a residential parcel on roughly the western third of the property and a non-residential parcel on the remaining portion. SunCor sold the non-residential parcel and performed soil sampling on the residential parcel, which indicated that maximum concentrations of arsenic and toxaphene were below the residential SRLs. (Ex. 103, at MOR19430.) SunCor later amended the 2004 DEUR to remove the residential parcel from the DEUR ("2009 DEUR"). (*See* Ex. 183, at SHOCK_000060 (illustrating 2004 DEUR and 2009 DEUR boundaries); *see generally* Ex. 2.)

B. Moreland's Ownership and Remediation of Tract D

1. Moreland Discovers Elevated Arsenic Concentrations

In December 2010, Moreland purchased a parcel of land that was still subject to the DEUR ("Tract D"), intending to resell it to a commercial developer. Tract D encompassed approximately 4.50 acres of the DEUR-restricted property and included all seven of Goodyear's

remedial excavations in the former Operations Area.[5] (Ex. 183, at SHOCK_000011, 60 (illustrating Tract D boundary, parcel 50814898), 71.)



5. The remaining property subject to the DEUR includes the right-of-way bordering McDowell Road and 159th Avenue, as well as an isolated segment of land in the northwest corner of the Operations Area. (Ex. 183, at SHOCK_000060; Ex. 100, ("WTI Report") at GOODYEAR00006287.)

Moreland reviewed the 2004 DEUR but did not consult ADEQ's additional records detailing Goodyear's remediation. In August 2014, Moreland and Spectrum Acquisition Goodyear, LLC ("Spectrum") signed a purchase and sale contract for Tract D. Spectrum offered Moreland a higher purchase price if Tract D was suitable for residential use, so Moreland hired Western Technologies, Inc. ("WTI") to "conduct shallow soil sampling and testing . . . to evaluate whether extensive surficial areas might be impacted which would require remediation in order to meet residential soil remediation levels" across Tract D. (WTI Report at GOODYEAR00006289.)

WTI took 32 "grid samples" from 21 evenly distributed locations across the property, with samples ranging from 1 to 12 inches in depth. (*Id.* at GOODYEAR00006289-91.) WTI avoided sampling grid locations that contained clean soil imported during Goodyear's remediation so WTI could more accurately delineate the extent of remediation necessary to meet residential SRLs. (*Id.* at GOODYEAR00006290.) Of the 26 samples tested for arsenic, 18 exceeded the non-residential SRL.[6] (*Id.* at GOODYEAR00006309.) WTI also tested 16 "source area" samples of the soil peripheral to Goodyear's excavations for arsenic, nine of which exceeded the non-residential SRL. (*Id.* at GOODYEAR00006291, 6310.)

WTI notified Moreland in January 2015 that it was possible that the 2004 DEUR had underestimated the 95% UCL concentrations. WTI informed Moreland that it could excavate a portion of Tract D to achieve residential

6. Arsenic concentrations ranged from 3.9 mg/kg to 550 mg/kg. (WTI Report at GOODYEAR00006309.)

SRLs. (*Id.* at GOODYEAR00006295.) It indicated that less expensive remediation alternatives were also possible, but these would likely require "increased agency interaction and frequently less certainty in the schedule for the project." (*Id.*) WTI did not identify these potential alternatives in its report. (*See generally id.*) Spectrum did not purchase Tract D.

2. Moreland's Administrative Settlement Agreement

Moreland hired Gallagher & Kennedy ("G&K") and Synergy Environmental, LLC ("Synergy") in 2017 to address the elevated arsenic and toxaphene levels found at Tract D. In August 2017, G&K communicated to ADEQ Moreland's intent to conduct additional soil sampling to define "the vertical and horizontal extent of arsenic and toxaphene concentrations" at Tract D. (Ex. 38.) Synergy issued a Remedial Refinement Sampling Report ("Sampling Report") in December 2017 that discussed Synergy's sampling of Tract D. (Ex. 6, ("Summary Report Vol. 2") at MOR00324-464.) Synergy collected 64 soil samples, which identified arsenic concentrations ranging from 5.05 to 135 mg/kg and toxaphene concentrations from less than 0.40 to 20.5 mg/kg. (*Id.* at MOR00333-34.) The Sampling Report indicated that Synergy sampled Tract D assuming a site-specific SRL of 25 mg/kg for arsenic.[7] (*Id.* at MOR00326.)

7. ADEQ may approve site-specific, risk-based SRLs when contaminants exceed Arizona's statutory SRLs. A.R.S. § 49-152(B); (LePage Tr. 35:18-38:14.) A site-specific SRL would have required Moreland to conduct a "site-specific human health risk assessment." As explained below, Moreland did not do this.

Appendix C

Following the Sampling Report, G&K scheduled a meeting with ADEQ in February 2018 to discuss initiating a cleanup of Tract D, "[s]ite-specific standards consistent with other DEURs issued by ADEQ," and issuing a new DEUR or modifying the 2004 DEUR. (*See* Ex. 39.) ADEQ subsequently informed Moreland in June 2018 that no further remediation was necessary to use Tract D for non-residential purposes. (*See* Ex. 41.) However, on December 20, 2018, Moreland published a "Notice of 30-day Public Comment Period Administrative Settlement Agreement" ("Notice of Settlement") in the Arizona Business Gazette. (Ex. 63, ("Notice of Settlement") at MOR01342.) The Notice of Settlement explained that Moreland and ADEQ would enter into a proposed administrative settlement agreement that would "resolve[] ADEQ's claims against Moreland," through a covenant not to sue. (*Id.*)

In March 2019, ADEQ and Moreland entered into the Administrative Settlement Agreement ("Settlement Agreement"), which required Moreland to "prepare and implement a remedial action plan [to] address the soil contamination at [Tract D] to meet applicable non-residential standards that are protective of public health and the environment, based on the 95% [UCL] estimates of the mean concentrations of the soils left in place." (Ex. 3, ("Settlement Agreement") at GOODYEAR00002960.) The Settlement Agreement indicated that the 95% UCL concentration at Tract D was 34.7 mg/kg for arsenic. (*Id.* at GOODYEAR00002956.) The Settlement Agreement would also release Moreland from liability upon its successful implementation of a remedial action plan. (*Id.* at GOODYEAR00002961.)

Witness Dennis Shirley, the owner of Synergy, testified that Moreland entered into the Settlement Agreement to avoid the additional costs and procedures associated with the Voluntary Remediation Program ("VRP"). (Dennis Shirley Trial Tr. ("Shirley Tr.") 281:20-282:3.) Witness Tina LePage[8] explained that ADEQ prefers for property owners to proceed through the VRP because it enables ADEQ to have greater oversight of the remediation process. (Tina LePage Trial Tr. ("LePage Tr.") 9:16-19, 10:21-11:2.) While the VRP requires the property owner to pay an application fee plus an hourly rate for ADEQ's time, ADEQ's guidance often helps minimize a party's response costs. (*Id.* at 9:20-10:2, 10:18-11:2; Laura Malone Trial Tr. ("Malone Tr.") 57:23-25.) By contrast, ADEQ reviews and comments on reports submitted by parties under an administrative settlement agreement but does not directly supervise the response. (Malone Tr. 56:25-57:16, 58:8-11; LePage Tr. 11:3-6.) A landowner proceeding through the VRP receives a "No Further Action" letter from ADEQ, which, unlike an administrative settlement agreement, does not release the landowner of liability. (Malone Tr. 10:1-11:3.)

3. Synergy's Work Plan to Excavate Tract D

In July 2019, Synergy submitted to ADEQ a draft work plan to satisfy Moreland's obligations under the Settlement Agreement ("Work Plan"). The Work Plan stated that WTI and Synergy's cumulative soil sampling

8. Ms. LePage is the Manager of Remedial Projects at ADEQ and helped oversee Moreland's cleanup of Tract D. (LePage Tr. 6:6-22.)

results indicated a 95% UCL arsenic concentration of 35.5 mg/kg and toxaphene concentration of 7.8 mg/kg on Tract D. (Ex. 4, ("Work Plan") at MOR02205.) Based on this sampling data, the Work Plan purported "to optimally plan for the appropriate excavation of contaminated soils to reduce the resulting arsenic concentration in residual soils to achieve the cleanup criteria of 10 mg/kg specified in the [2004] DEUR." (*Id.* at MOR02206.) The Work Plan "propose[d] to excavate and transport the most highly impacted soil to an offsite disposal facility" and scrape the "upper six inches of the surface soils" with lower arsenic concentrations to place in the primary excavation sites. (*Id.* at MOR02196.) ADEQ did not request or require Moreland to excavate the six inches of surface soils. (LePage Tr. 30:16-31:5.)

The Work Plan did not assess the possibility of a site-specific SRL. (*Id.* at MOR02203 (indicating that Synergy was asked to analyze the potential for a site-specific SRL); Shirley Tr. 16:18-17:4 (stating that Moreland "went quite a ways" to consider a site-specific SRL but chose excavation).) Mr. Shirley testified that this was because a site-specific SRL would have "still require[d] a significant amount of soil excavation," in addition to more ADEQ oversight. (Shirley Tr. 224:9-23.) The Work Plan did not address any remediation alternatives to soil excavation, analyze the cost-effectiveness of the excavation, or discuss whether the proposed excavation was necessary to protect human health and the environment. (*Id.* at 224:24-226:2; *see generally* Work Plan.) Though Synergy had drafted the Work Plan before the Settlement Agreement, the Work Plan was not included for public review and comment

in the Notice of Settlement. (*See generally* Settlement Agreement; Notice of Settlement; Ex. 123.)

ADEQ reviewed the Work Plan and requested additional information on, *inter alia*, Moreland's intended future use for Tract D because "ADEQ [needed to] understand the end use for the land (i.e. residential, commercial, parking, etc.) to drive critical decisions, such as size of Decision Units for sampling." (Ex. 122, at MOR01165.) These Decision Units would "represent future exposure areas" and help "to develop a remedial endpoint." (*Id.*) ADEQ also informed Moreland that it could evaluate risk-based, site-specific SRLs for Tract D instead of achieving the statutory SRLs. (*Id.*) ADEQ also stated that it was unclear whether Moreland planned to remove or modify the 2004 DEUR. (*Id.*) G&K responded that Moreland "always" intended "to actually achieve the specified soil-contaminant concentrations that ADEQ confirmed existed in the DEUR prior to [its] purchase of the property." (Ex. 123, at MOR18532.) Ms. LePage testified that she did not know whether Moreland ever proposed a risk assessment to pursue site-specific SRLs for Tract D.[9] (LePage Tr. 37:10-16.)

Because Moreland elected to pursue the Settlement Agreement, ADEQ did not evaluate the Work Plan as vigorously as it would have under the VRP program. (*Id.* at 23:11-24:5, 27:11-28:19.) ADEQ approved the Work Plan on September 30, 3019. (Ex. 10, at GOODYEAR00007636.)

9. Synergy did not have a risk assessor working on the remediation of Tract D who could have aided in creating a risk assessment. (Shirley Tr. 128:16-129:13.)

4. Synergy's Excavation of Tract D

Approximately two weeks before beginning its excavation, Synergy distributed flyers to nearby homes and installed a sign at Tract D describing the excavation and stating that the Work Plan was available for review. (Summary Report Vol. 1 at MOR00028; Summary Report Vol. 2 at MOR0716-720.) The flyer provided contact information for interested parties to submit "questions regarding the planned soil cleanup or concerns or complaints during the course of the work" but did not otherwise solicit public feedback on the Work Plan. (Summary Report Vol. 2 at MOR0717.)

Synergy identified a 1.5 acre "Area of Impact" that "contain[ed] the highest concentrations of arsenic (and toxaphene)" at Tract D. (Summary Report Vol. 1 at MOR00021-22.) Synergy excavated and disposed of nearly 3,500 tons of soil from the Area of Impact. (*Id.* at MOR00031.) Though Synergy originally planned to reuse the clean soil H&A imported into the Area of Impact as fill, Synergy "abandoned" this "relatively small" cost-saving approach and instead disposed of the soil because of the effort required to isolate it from contaminated soil. (*Id.* at MOR00030; *see* Shirley Tr. 105:21-107:1.) Synergy instead "scraped" the upper six inches of the entirety of Tract D and used that scraped soil as fill in the Area of Impact. (Summary Report Vol. 1, at MOR00022, 31.) Synergy excavated this peripheral soil, approximately 3,150 tons, as a "cautionary step," even though the soil was "generally at or below the specified contaminant limits in the 2004 DEUR." (*Id.* at MOR00022.) Synergy imported clean soil

to fill the Area of Impact and to cover all of Tract D with 6 inches of clean soil. (*Id.* at MOR00022-23, 32.)

Synergy issued a report titled "Removal Action to Address Residual Arsenic Contamination in Shallow Soils" ("Summary Report") on July 28, 2020, which documented Synergy's excavation of contaminated soil at Tract D.[10] (*See generally* Summary Report Vol. 1; Summary Report Vol. 2; Ex. 7.) In the Summary Report, Synergy calculated pre-excavation 95% UCL concentrations of 154 mg/kg for arsenic and 28 mg/kg for toxaphene.[11] (Summary Report Vol. 1 at MOR00020, 46-47.) Synergy chose to use only WTI's 21 grid samples collected at 3 to 6 inches below

10. Synergy characterized its excavation in both the Work Plan and Summary Report as a "removal action." (Work Plan at MOR02192; Summary Report Vol. 1 at MOR00001.) ADEQ did not approve Synergy's excavation specifically as a removal action as defined under CERCLA, however. (LePage Tr. 20:3-21:4 (explaining that ADEQ does not distinguish between "removal" or "remedial" actions under Arizona law).)

11. Synergy and WTI's cumulative sampling shows that H&A may have failed to adequately excavate portions of the Operations Area, leaving higher levels of residual arsenic across Tract D. However, because both Synergy and WTI only used sampling data from Tract D, a fraction of the Operations Area, the Court cannot conclude that Goodyear's 95% UCLs for the entire Operations Area in the 2004 DEUR were in fact underestimated. (Shirley Tr. 138:12-16, 179:17-180:3.) Though Moreland's expert, Dr. Speyer, disagreed with H&A's 95% UCL methodology and questioned the validity of its data, neither he nor any of Moreland's witnesses provided evidence that Goodyear's 95% UCL calculation for the entire Operations Area was inaccurate. (*See, e.g.*, Ex. 22, at SPEYER_000040-69; Shirley Tr. 140:25-142:7 (explaining that Synergy did not "interpolate" data to evaluate arsenic impact over the Operations Area).)

ground surface to calculate the 95% UCL because Synergy believed that this sample set was most representative of the arsenic contamination on Tract D. (*Id.* at MOR00019, 46-47.) Using the soil samples representative of the soil remaining at Tract D, Synergy calculated the post-excavation UCLs to be 9.9 mg/kg for arsenic and 4.9 mg/kg for toxaphene but estimated that excavating the top six inches of Tract D reduced the concentrations closer to 5.7 mg/kg and 1.7 mg/kg, respectively.[12] (*Id.* at MOR00023-24, 54-57.) Synergy did not conduct post-remediation soil sampling. (Shirley Tr. 99:9-16.)

Though Mr. Shirley testified that he was unaware of any viable remedial alternatives for Tract D, Synergy did not prepare a feasibility study as part of its Work Plan or Summary Report that assessed any such alternatives. (*Id.* at 177:20-178:2, 305:11-306:15, 403:7-404:8 (stating that various remedial alternatives would not have been reasonable).) Synergy's reports also did not evaluate whether the arsenic on Tract D posed an imminent threat to human health or the environment. (*Id.* at 354:11-14;

12. When asked why Synergy did not use all of WTI's grid samples to calculate the pre-excavation 95% UCL, Mr. Shirley testified that the 21 samples represented "the most consistent data" of Tract D. (Shirley Tr. 296:1-298:10.) However, Synergy used all available grid samples to calculate the expected 95% UCL of soils remaining in place after its excavation, without explaining why it departed from its pre-excavation methodology. (*Id.* 298:13-299:19; Summary Report Vol. 1 at MOR00023, 23 n.16.) This, plus the fact that Synergy used different data sets for its calculations in each of the Settlement Agreement, Work Plan, and Summary Report (none of which included any samples from Goodyear's excavation sites) cast doubt on the reliability of Synergy's pre-excavation 95% UCLs.

see generally Work Plan; Summary Report Vol. 1.) In October 2020, ADEQ confirmed that Moreland satisfied its obligations under the Settlement Agreement. (*See* Ex. 11.)

II. CONCLUSIONS OF LAW

A. CERCLA Claim [13]

CERCLA "generally imposes strict liability on owners and operators of facilities at which hazardous substances were disposed." *Carson Harbor Vill., Ltd. v. Unocal Corp.* (*Carson Harbor I*), 270 F.3d 863, 870 (9th Cir. 2001) (en banc) (quoting *3550 Stevens Creek Assocs. v. Barclays Bank*, 915 F.2d 1355, 1357 (9th Cir. 1990)), cert. denied *sub nom. Carson Harbor Vill., Ltd. v. Braley*, 535 U.S. 971, 122 S. Ct. 1437, 152 L. Ed. 2d 381 (2002). To succeed on its CERCLA claim, Moreland must prove the following elements by a preponderance of the evidence:

> (1) the site on which the hazardous substances are contained is a "facility" as defined in 42 U.S.C. § 9601(9); (2) a "release" or "threatened release" of a "hazardous substance" has occurred; (3) the "release" or "threatened

13. The Court finds that Moreland abandoned its WQARF claim. Moreland makes only a passing reference to WQARF in a footnote in the parties' joint proposed pretrial order, in which Moreland stated that it "reserve[d] the right to pursue recovery under WQARF in the alternative to its [§] 107/113 claims under CERCLA." (Doc. 141 at 2 n.1.) Nor did Moreland include its WQARF claim in its proposed findings of fact and conclusions of law, or argue the WQARF claim during closing argument.

> release" has caused the plaintiff to incur response costs that were "necessary and "consistent with the national contingency plan"; and (4) the defendants are in one of four classes of persons subject to liability under § 9607(a).

Carson Harbor Vill. v. County of Los Angeles (*Carson Harbor III*), 433 F.3d 1260, 1265 (9th Cir. 2006).

A facility includes "any site or area where a hazardous substance has been deposited, stored, disposed of, or placed, or otherwise come to be located." 42 U.S.C. § 9601(9). Courts construe the term "facility" in broad terms, such that a "plaintiff need only show that a hazardous substance under CERCLA is placed there or has otherwise come to be located there." *Stevens Creek*, 915 F.2d at 1360 n.10 (quoting *United States v. Metate Asbestos Corp.*, 584 F. Supp. 1143, 1148 (D. Ariz. 1984)). Tract D is a facility, as Marsh's crop-dusting operations caused the release of hazardous substances there.[14] *See* 42 U.S.C. § 9601(22) (defining "release"); 40 C.F.R. § 302.4 (listing arsenic and toxaphene as hazardous substances).

Goodyear is also a potentially responsible party subject to liability as a former owner of Tract D, as there was a "disposal" of "hazardous waste" during its ownership. Specifically, Marsh's operations caused the

14. Tract D is not a facility distinct from the Goodyear Property. That Moreland purchased a fraction of the Goodyear Property does not negate that Marsh released arsenic and toxaphene on what later became Tract D. Further, Moreland proved by a preponderance of the evidence that the arsenic and toxaphene at Tract D was residual contamination released by Marsh.

"dumping, spilling, leaking, or placing" of "solid, liquid, [or] semisolid" materials onto Tract D. 42 U.S.C. § 9601(29) (adopting definitions of "disposal" and "hazardous waste" in section 1004 of the Solid Waste Disposal Act); *see Carson Harbor I*, 270 F.3d at 875 (a past owner is a potentially liable party under § 9607(a)(2) if there was a "'discharge, deposit, injection, dumping, spilling, leaking, or placing' of contaminants on the property during their ownership").

This leaves only the third element at issue: whether Moreland's response costs in excavating the contaminated soil at Tract D were necessary and consistent with the national contingency plan ("NCP"). *See Carson Harbor I*, 270 F.3d at 870-71; *AmeriPride Servs. Inc. v. Texas E. Overseas Inc.*, 782 F.3d 474, 490 (9th Cir. 2015) (holding that response costs must be necessary and consistent with the NCP for contribution claims). The Court finds that Moreland has not shown that its response costs were necessary or consistent with the NCP.

1. Moreland's Response Was a Remedial Action

A threshold question is whether Moreland's response to the contamination at Tract D was a removal action or a remedial action, as the NCP prescribes heightened procedural requirements for remedial actions. *United States v. W.R. Grace & Co.*, 429 F.3d 1224, 1228 (9th Cir. 2005); *compare* 40 C.F.R. § 300.415 (removal actions), *with* 40 C.F.R. § 300.430 (remedial actions). Whether a response is a removal action or remedial action is a question of law. *Carson Harbor Vill., Ltd. v. Unocal Corp.* (*Carson Harbor II*), 287 F. Supp. 2d 1118, 1157 (C.D. Cal. 2003), *aff'd* 433 F.3d 1260.

Appendix C

CERCLA defines a "removal" as:

> [T]he cleanup or removal of released hazardous substances from the environment, such actions as may be necessary taken in the event of the threat of release of hazardous substances into the environment, such actions as may be necessary to monitor, assess, and evaluate the release or threat of release of hazardous substances, the disposal of removed material, or the taking of such other actions as may be necessary to prevent, minimize, or mitigate damage to the public health or welfare or to the environment, which may otherwise result from a release or threat of release.

42 U.S.C. § 9601(23). By contrast, remedial actions are:

> [T]hose actions consistent with permanent remedy taken instead of or in addition to removal actions in the event of a release or threatened release of a hazardous substance into the environment, to prevent or minimize the release of hazardous substances so that they do not migrate to cause substantial danger to present or future public health or welfare or the environment.

Id. § 9601(24).

Recognizing the ambiguity of these terms, the Ninth Circuit distinguished between removal and remedial

actions in *W.R. Grace*. There, the EPA conducted a cleanup of asbestos contamination after the EPA "extensively documented" the contamination's "imminent and substantial threat to human health and the environment." 429 F.3d at 1234. The Ninth Circuit noted that removal actions are "prompt action[s]" to mitigate "the immediacy of a threat" to human health or the environment. *Id.* at 1244. In other words, "removal actions encompass interim, partial time-sensitive responses taken to counter serious threats to public health," whereas remedial actions are "comprehensive" responses to contamination at a site. *Id.* at 1245. The Court explained that "[c]rucial to [its] determination [was] the documented evidence that, *absent immediate attention*, the airborne toxic particles would continue to pose a substantial threat to public health." *Id.* at 1247 (emphasis added); *see also Carson Harbor II*, 287 F. Supp. 2d at 1155 (landowner's cleanup of lead-contaminated tar and slag materials was a remedial action because the landowner presented no evidence of an imminent threat to human health or the environment).

The Court concludes that Moreland's cleanup of Tract D was a remedial action and not a removal action. Moreland presented no evidence that the elevated arsenic or toxaphene concentrations in the soil required "immediate attention" to mitigate a substantial threat to public health or environment.[15] For example, groundwater

15. Moreland argued that Tract D required a prompt response because potential buyers were interested in purchasing the property. Unlike imminent threats to health and the environment, a prospective business deal is not the type of "time-sensitive" matter for which the NCP was designed to afford "considerable leeway in structuring the

contamination was not of concern. (Summary Report Vol. 1 at MOR00012.) Nor did Moreland show that "absent immediate attention," the arsenic or toxaphene, which had remained undisturbed in the soil for several years, threatened human health. (*See* Speyer Tr. 159:13-17 (explaining that human exposure to arsenic includes inhalation, contact with the skin, and ingestion).) Moreover, it took Moreland more than two years of planning before it began its excavation. (*See* Ex. 39 (setting agenda for meeting with ADEQ in February 2018); Summary Report Vol. 1 at MOR00030 (excavation began April 28, 2020).) This "slow pace of the cleanup underscores the lack of any imminent threat to health or safety that is typically viewed as a critical element of any 'removal action.'" *Long Beach Unified Sch. Dist. v. Santa Catalina Island Co.*, No. CV 19-1139-JFW(ASx), 2021 WL 4706552, at *11 (C.D. Cal. Aug. 17, 2021) (citing *W.R. Grace*, 429 F.3d at 1244).[16]

2. Moreland Did Not Substantially Comply with the NCP

Moreland has the burden of proving that the remediation costs were "consistent with" the NCP. *Carson*

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cleanup." *W.R. Grace*, 429 F.3d at 1227-28. The Court is unaware of any caselaw or EPA guidance that suggests otherwise.

16. Nor was Moreland's excavation a non-time critical removal action. *See Long Beach Unified Sch. Dist.*, 2021 WL 4706552, at *11 (requiring a "sufficiently serious" threat to health or the environment such "that the added time needed to comply with remedial requirements . . . would be unacceptable" (citation omitted) (alteration in original)).

Harbor III, 433 F.3d at 1265 (citing 42 U.S.C. § 9607(a)(4)(B)). "It is 'designed to make the party seeking response costs choose a cost-effective course of action to protect public health and the environment.'" *Id.* (quoting *Wash. State Dep't of Transp. v. Wash. Nat. Gas Co.*, 59 F.3d 793, 802 (9th Cir. 1995)). A private remedial action is "'consistent with the NCP' if the action, when evaluated as a whole, is in substantial compliance with" the NCP's applicable requirements. 40 C.F.R. § 300.700(c)(3)(i). The EPA endorses holistic evaluations of remediations rather than requiring "a list of rigid requirements" that could otherwise "defeat cost recovery for meritorious cleanup actions based on a mere technical failure by the private party." *Carson Harbor II*, 287 F. Supp. 2d at 1160 (quoting National Oil and Hazardous Substance Pollution Contingency Plan, 55 Fed.Reg. 8666, 8793 (Mar. 8, 1990)); *see* 40 C.F.R. § 300.700(c)(4) (tolerating "immaterial or insubstantial deviations" from the NCP). Relevant to this lawsuit, the NCP requires a private party to (1) prepare a remedial investigation and feasibility study and (2) provide an opportunity for public participation. 40 C.F.R. § 300.700(c)(5)(viii), (6)(iii)-(iv).

a. No Feasibility Study

Moreland made no attempt to develop a feasibility study. A feasibility study "ensure[s] that appropriate remedial alternatives are developed and evaluated such that relevant information concerning the remedial action options can be presented to a decision-maker and an appropriate remedy selected." *Id.* § 300.430(e)(1). Using

the data collected during the remedial investigation,[17] the party must conduct a feasibility study that develops and screens potential remedial alternatives, including a "no-action alternative, which may be no further action if some removal or remedial action has already occurred at the site." *Id.* § 300.430(e)(1)-(2), (6). When developing these alternatives, the party should consider each alternative's effectiveness, ease of implementation, and cost. *Id.* § 300.430(7). The feasibility study must then analyze a "limited number" of these "alternatives that represent viable approaches to remedial action." *Id.* § 300.430(9).

Synergy did not include a feasibility study in its Work Plan or Summary Report.[18] Instead, The Work

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17. A remedial investigation "collect[s] data necessary to adequately characterize the site for the purpose of developing and evaluating effective remedial alternatives" in the feasibility study. *Carson Harbor III*, 433 F.3d at 1267 (quoting 40 C.F.R. § 300.430(d)(1)). Moreland substantially complied with the NCP's remedial investigation requirements. *See* 40 C.F.R. § 300.430(d)(1)-(4). Synergy and WTI assessed the extent of arsenic and toxaphene contamination at Tract D and identified Marsh's aerial spraying activities as the source of the contamination. *See id.* § 300.430(d)(2). Synergy also identified that the arsenic and toxaphene were not risks to groundwater, though it did not characterize any "current and potential threats to human health." *Id.* § 300.430(d)(4) (requiring party to conduct a risk assessment of the contaminants to "help establish acceptable exposure levels").

18. Moreland also did not produce anything suggestive of a "focused" or "streamlined" feasibility study. *See* 55 Fed.Reg. 8793 (enumerating appropriate circumstances for a "streamlined analysis" and explaining that fewer remedial alternatives in a "focused" feasibility study may be consistent with the NCP in "appropriate

Plan offered only a single solution: to excavate the contaminated soil at Tract D.[19] (Work Plan at MOR02196-97, 2206.) Moreland's decision to not consider any remedial alternatives is evidenced by the fact that it "always" intended to remediate Tract D to the arsenic level stated in the 2004 DEUR. (*See* Ex. 123.) This is no "mere technicality" or "insubstantial deviation" from the NCP, but noncompliance. *See Carson Harbor III*, 433 F.3d at 1268-69 (finding no substantial compliance with NCP where party's remedial action plan did not discuss any alternatives to physical removal and did not assess the effectiveness, cost, or ease of implementation of its chosen remediation).

b. No Opportunity for Meaningful Public Participation

The NCP also requires "meaningful public participation" for a party to achieve a CERCLA-quality

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cases"). Nor is the Court persuaded that Moreland could use previous investigations of the Goodyear Property as a substitute for conducting its own feasibility study. These investigations did not consider arsenic a contaminant of concern. (Work Plan at MOR02197-2200, 2206-08 *see generally* Ex. 58; Ex. 59 (proposing remedial alternatives for toxaphene and not arsenic).) Even after Ogden drafted its SAP, ADEQ required Ogden to amend the SAP to sample for arsenic. Moreland provided no other evidence of any remedial alternatives specific to address the arsenic contamination at Tract D, which was the focus of its own remediation.

19. Similarly, the WTI Report informed Moreland that less expensive remedial alternatives to excavation might have been available but did not identify or discuss these possibilities. (WTI Report at GOODYEAR00006295.)

cleanup. 55 Fed.Reg. 8793. The party conducting the cleanup must make reasonable efforts to interview local officials, community residents, and other interested parties "to solicit their concerns." 40 C.F.R. § 300.430(c)(2)(i). The party must also maintain an "information repository" near the property and develop a "community relations plan." *Id.* at § 300.430(c)(2)(ii)-(iii). Following the feasibility study, the party "shall" make a "proposed plan" available to the public that describes the remedial alternatives, proposes the party's preferred remedial alternative, and identifies the information used to select this preferred alternative. *Id.* at § 300.430(f)(2)-(3). "The purpose of the proposed plan is to supplement the RI/FS" and provide the public an opportunity "to participate in the selection of [the] remedial action." *Id.* at § 300.430(f)(2).

Moreland did not substantially comply with the NCP's public participation requirement. There is no evidence that Moreland prepared a community relations plan or published any proposed plan[20] to ensure that the public had a "meaningful" opportunity "to participate in the selection of [the] remedial action." 40 C.F.R. § 300.430(f)(2)-(3); *see Carson Harbor III*, 433 F.3d at 1266 n.5 (finding no public participation where there was no evidence of a "community relations plan, that the public was given notice of the remedial action, that the remediation plan was published or otherwise made available to the public, that any public meeting was held, or that any other opportunity for public comment was given"). The

20. Even had the Work Plan included a feasibility study, it was never published to the public, despite being drafted before the Settlement Agreement.

Notice of Settlement indicated only that the Settlement Agreement was available for review and comment, but the Settlement Agreement did not propose any remedial action.[21] (*See* Notice of Settlement; Settlement Agreement at GOODYEAR00002960-61 (requiring Moreland to "prepare and implement a remedial action plan").) Moreover, Moreland's notice to nearby residents just two weeks before Synergy began its excavation did not solicit feedback on the chosen remediation itself but invited neighbors to submit "concerns or complaints *during* the course of work." (Summary Report Vol. 2 at MOR00717 (emphasis added)); *c.f. Waste Mgmt. of Alameda Cnty., Inc. v. East Bay Reg'l Park Dist.*, 135 F. Supp. 2d 1071, 1102 (N.D. Cal. 2001) (finding no "meaningful public participation" where the remediating party "was unlikely to seriously reconsider its intended remedy" that it had proposed three years before publishing notice of the remedy).

Nor was ADEQ's involvement with Moreland's remediation an adequate substitute for public participation. In *Carson Harbor III*, the Ninth Circuit held that an

21. Moreland was required to publish notice of the Settlement Agreement pursuant to A.R.S. § 49-289.03(A)(4) and A.A.C. R18-16-301. The Court finds that these provisions are not "substantially equivalent" to the NCP's public participation requirement because they did not require Moreland to provide the public any opportunity to participate in the selection of a remedy. *See* 40 C.F.R. § 300.700(c)(6) (permitting public participation through "substantially equivalent state and local requirements"); *compare* A.R.S. § 49-289.03(A)(4) *and* A.A.C. R18-16-30140, *with* C.F.R. § 300.430(f)(3)(i)(A) (requiring published "notice of availability and brief analysis of the *proposed plan* in a major local newspaper") (emphasis added)).

agency's actions did not fulfill Carson Harbor's public participation requirement because the agency "was involved in a very limited fashion."[22] 433 F.3d at 1267. The agency "did not take a lead role" in the remediation or "oversee the cleanup," but "merely approved" the plaintiff's proposed remedial action plan "with very minor modifications," and inspected the property after the remediation. *Id.* at 1263-64, 1267. ADEQ's involvement with Moreland's excavation was similar. ADEQ reviewed and approved the Work Plan and Summary Report, but otherwise did not directly participate in the remediation because Moreland was not in the VRP. Ms. Malone and Ms. LePage both testified that they were unaware of the extent to which ADEQ verified the accuracy and adequacy of information that Moreland submitted throughout the remediation. (*See, e.g.*, Malone Tr. 78:24-83:12; LePage Tr. 19:8-12, 23:18-25:13, 27:11-25, 30:5-7, 32:19-33:8.)

The Court finds that Moreland's remediation did not substantially comply with the NCP because Moreland did not conduct any feasibility study or provide the public with a meaningful opportunity to participate in developing its remediation of Tract D.

3. Moreland Did Not Show its Response Costs Were "Necessary"

Response costs are "necessary" if "there is a threat to human health or the environment and . . . the response

22. The Ninth Circuit declined to decide whether "significant agency involvement" could satisfy the public participation requirement because the agency's involvement with Carson Harbor was nevertheless insufficient. 433 F.3d at 1266-67.

action is addressed to that threat." *Carson Harbor I*, 270 F.3d at 872. "The issue is not why the landowner decided to undertake the cleanup, but whether it was necessary" to address "an actual and real threat human health or the environment." *Id.* at 871-72 (rejecting the "ulterior motive" analysis which focuses on a party's business or other motive in remediating its property).

Moreland has not shown that its response costs were necessary. Moreland has not detailed how many truckloads of excavated soil might have been necessary to protect human health and the environment at Tract D. In fact, Moreland presented no analysis of the arsenic's threat to human health or the environment. Notably, ADEQ informed Moreland that it could explore site-specific SRLs for Tract D, but G&K represented that Moreland "always" intended to remediate Tract D to the contaminant concentrations in the 2004 DEUR[23] and declined to analyze this alternative. *See* A.R.S. § 49-152(B). Without a risk assessment or feasibility study, there no evidence that remediating Tract D to the contaminant levels in the 2004 DEUR was necessary to protect human health or

23. Even then, Moreland incurred costs that it knew were disproportionate to achieve this goal. Specifically, Synergy "scraped" the top six inches of soil across the entirety of Tract D even though this peripheral soil was "at or below" the non-residential SRLs. (Summary Report Vol. 1 at MOR00022, 51-53 (listing toxaphene and arsenic concentrations of the excavated surficial soils).) Synergy estimated that this reduced Tract D's 95% UCL concentration of arsenic to 5.7 mg/kg and toxaphene to 1.7 mg/kg, both well below the *residential* SRLs. (*Id.* at MOR00024.) Moreland has not shown that such excavation was necessary to remediate to the levels stated in the 2004 DEUR, or to protect human health or the environment. (*Id.* at MOR00022, 31; *see* Shirley Tr. 180:10-184:3, 228:6-18.)

the environment, particularly when Moreland disregarded ADEQ's suggestion to assess a site-specific SRL.[24] And while "an actual agency cleanup order is highly relevant and, in some cases, compelling on the necessity question," the evidence suggests that ADEQ considered Moreland's remediation to be voluntary, even though Moreland did not proceed through the VRP. (LePage Tr. 28:20-29:4; Malone Tr. 54:13-55:4 (explaining that Moreland contacted ADEQ voluntarily to remediate Tract D).)

The Court concludes that Moreland is not entitled to damages because it did not prove that its response costs were "necessary" and "consistent with" the NCP.[25] *Carson Harbor III*, 433 F.3d at 1269 (affirming summary judgment were plaintiff failed to substantially comply with the NCP); *Washington Nat. Gas Co.*, 59 F.3d at 805.

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24. Contrary to Mr. Shirley's testimony, the Settlement Agreement did not require Moreland to remediate Tract D to the contaminant levels stated in the 2004 DEUR, but instead specified only that Moreland had "to meet applicable non-residential standards that are protective of public health and the environment." (Shirley Tr. 61:19-24; Settlement Agreement at GOODYEAR00002960.) ADEQ suggested site-specific SRLs to Moreland after the Settlement Agreement as a method to satisfy this objective. *See* A.R.S. § 49-152(B) (site-specific SRLs are risk-based); AZ ADC R18-7-206.

25. Because Moreland is not entitled to damages under CERCLA, the Court need not address whether Moreland's claim was a § 107 cost recovery action or a § 113 contribution claim. *AmeriPride Services Inc.*, 782 F.3d at 489-90 (explaining that response costs must be necessary and consistent with the NCP for both cost recovery and contribution actions).

B. Implied Covenant of Good Faith and Fair Dealing

Moreland also brings a claim for Goodyear's alleged breach of an implied covenant of good faith and fair dealing. Arizona "law implies a covenant of good faith and fair dealing in every contract." *Rawlings v. Apodaca*, 726 P.2d 565, 569 (Ariz. 1986) (en banc). "The implied covenant of good faith and fair dealing prohibits a party from doing anything to prevent other parties to the contract from receiving the benefits and entitlements of the agreement." *Wells Fargo Bank v. Arizona Laborers, Local No. 395 Pension Trust Fund*, 201 Ariz. 474, 38 P.3d 12, 28 (Ariz. 2002) (en banc). The duty "exists by virtue of a contractual relationship." *Id.* The 2004 DEUR did create a contractual relationship between Goodyear and ADEQ because it is a restrictive covenant and restrictive covenants are contracts. *Powell v. Washburn*, 211 Ariz. 553, 125 P.3d 373, 376 (Ariz. 2006) (en banc); *see* A.A.C. R18-7-601 (defining "DEUR"); (*see generally* 2004 DEUR.) Moreland was not a party to the 2004 DEUR between Goodyear and ADEQ, but instead argues that it was an intended third-party beneficiary of the 2004 DEUR.

To recover as a third-party beneficiary of a contract, "the contracting parties must intend to directly benefit that person and must indicate that intention in the contract itself." *Sherman v. First Am. Title Ins. Co.*, 201 Ariz. 564, 38 P.3d 1229, 1232 (Ariz. Ct. App. 2002) (citing *Norton v. First Fed. Sav.*, 128 Ariz. 176, 624 P.2d 854, 856 (Ariz. 1981)). "The contemplated benefit must be both intentional and direct." *Norton*, 624 P.2d at 856. Turning to the 2004

DEUR, the Court must "give effect to the intention of the parties" based on the language used in the covenant or the circumstances surrounding the covenant's creation. *Powell*, 125 P.3d at 377 (quoting Restatement (Third) of Property: Servitudes § 4.1(1) (2000)).

The 2004 DEUR is a "covenant that runs with and burdens the [Operations Area], binds [the landowner] and its heirs, successors, tenants, and assigns, and inures to the benefit of the Department and the State of Arizona." (2004 DEUR at GOODYEAR00000005); *see* A.R.S. § 49-152(F). It requires the landowner to "assure that the restricted area not be subject to residential use" and that the 2004 DEUR remain in effect "because contaminant levels exceed residential standards." (2004 DEUR at Goodyear000000004.) As Ms. LePage explained, a DEUR notifies all future landowners that the restricted property cannot be used for residential purposes. (LePage Tr. 42:19-24.) And it is required whenever a landowner "elects to leave contamination on a property that exceeds the applicable residential standard for the property." A.D.C. R18-7-208. A DEUR benefits Arizona by providing funding to the DEUR program and limits the State of Arizona's liability by preventing the residential use of property that ADEQ knows exceeds acceptable contaminant levels. (LePage Tr. 41:16-42:4); *see* A.R.S. § 49-152(F) (explaining that a DEUR "inures to the benefit of [ADEQ] and the state"); § 49-158(B) (same). ADEQ is also authorized by statute to enter a DEUR-restricted property to ensure the landowner is abiding by the use restriction. A.R.S. § 49-158(I).

The 2004 DEUR is a restrictive covenant that imposes a burden on Moreland. And while the 2004 DEUR "limits the use of [Tract D] to non-residential use," even if this restriction could be considered a "benefit" to Moreland, it is not "intentional and direct," but merely incidental to its primary purpose of preventing Moreland from putting Tract D to residential use. (2004 DEUR at GOODYEAR00000004.) The Court is unaware of any caselaw that would support finding otherwise.[26] Because Moreland was not an intended beneficiary of the 2004 DEUR, its breach of implied covenant of good faith and fair dealing claim fails as a matter of law.

III. CONCLUSION

The evidence suggests that H&A did not comply with all of the provisions in the SAR/CAP both in connection with its sampling requirements and some of the depths of excavation. However, the evidence does not show that

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26. Moreland's reliance on *Zambrano v. M & RC II LLC*, 254 Ariz. 53, 517 P.3d 1168 (Ariz. 2022), is misplaced. In *Zambrano*, the Arizona Supreme Court held that the implied warranty of workmanship and habitability "is enforceable by subsequent purchasers, despite a lack of contractual privity with the builder." 517 P.3d at 1174. The warranty guarantees that the builder-vendor "built the home in a workmanlike manner and that it is habitable," thereby protecting purchasers from latent defects in the home's construction. *Id.* Unlike the covenant of good faith and fair dealing, the warranty "is enforceable by subsequent purchasers" because it "arises from construction of the home itself." *Id.* (citation and internal quotations omitted). Further, the warranty is clearly intended to benefit of the home buyer, whereas the 2004 DEUR only "inures to the benefit" of ADEQ and the State of Arizona.

its calculation of the 95% UCL for the Operations Area was inaccurate. Nor has the evidence shown which of any of Synergy's 95% UCL calculations over Tract D reflect a correct 95% UCL prior to its remediation. Even if there were evidence that H&A's mistakes resulted in an erroneous 95% UCL and the representations of the 95% UCL in the 2004 DEUR were therefore inaccurate, Moreland would still be unable to obtain either CERCLA contribution or cost recovery because Moreland did not substantially comply with the NCP. And as explained above, Moreland does not have a claim for breach of contract based on the implied covenant of good faith and fair dealing.

IT IS ORDERED that judgment be entered in favor of Defendants Goodyear Tire & Rubber Company, and Goodyear Farms, Inc.

Dated this 27th day of July, 2023.

/s/ Susan R. Bolton
Susan R. Bolton
United States District Judge

APPENDIX D — JUDGMENT OF THE UNITED STATES DISTRICT COURT FOR THE DISTRICT OF ARIZONA, FILED JULY 27, 2023

IN THE UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF ARIZONA

NO. CV-20-02297-PHX-SRB

MORELAND PROPERTIES LLC,

Plaintiff,

v.

GOODYEAR TIRE & RUBBER COMPANY, *et al.*,

Defendants.

JUDGMENT IN A CIVIL CASE

Decision by Court. This action came for consideration before the Court for a bench trial. The issues have been tried and a decision has been rendered.

IT IS ORDERED AND ADJUDGED that pursuant to the Court's Order filed July 27, 2023, judgment is entered in favor of Defendants Goodyear Tire & Rubber Company, and Goodyear Farms Incorporated and against Plaintiff. Plaintiff to take nothing, and the complaint and action are dismissed.

Appendix D

Debra D. Lucas
District Court Executive/Clerk of Court

July 27, 2023

s/ S. Ferdig
By Deputy Clerk

APPENDIX E — MORELAND'S WORK PLAN TITLED "REMOVAL ACTION TO ADDRESS RESIDUAL ARSENIC CONTAMINATION IN SHALLOW SOILS AT THE FORMER MARSH AVIATION SITE," DATED JULY 10, 2019

WORK PLAN

REMOVAL ACTION TO ADDRESS RESIDUAL ARSENIC CONTAMINATION IN SHALLOW SOILS AT THE FORMER MARSH AVIATION SITE

DEUR ID 27423 / SITE CODE 509360-00 NWC MCDOWELL ROAD AND 159TH AVENUE GOODYEAR, ARIZONA

1.0 PROPERTY DESCRIPTION AND BACKGROUND

Moreland Properties LLC (Moreland) owns Maricopa County parcel number 508-14-898 in Goodyear, Arizona. As shown in **Figure 1**, this parcel is located at the northwest corner of McDowell Road and 159th Avenue and encompasses an area of approximately 4.5 acres (hereafter referred to as the "Site"). Most of the Site is covered by a 2004 Declaration of Environmental Use Restriction ("DEUR") as a result of the historical occurrence of toxaphene and arsenic in shallow soils at concentrations above respective Arizona residential soil remediation levels (SRLs) over portions of the parcel. The residual arsenic and toxaphene are associated with the past use of the property as an aerial pesticide and herbicide application airstrip with associated operations. This "crop

dusting" facility was operated by Marsh Aviation under lease from the land owner Goodyear Tire & Rubber Company (GTRC) for aerial application of pesticides (including organochlorine pesticides) and herbicides (including arsenous acid based defoliants) to local farmland. Toxaphene was the primary organochlorine pesticide used until the U.S. Environmental Protection Agency (EPA) banned it in the 1970s.

The Marsh Aviation spraying services operated between the early 1970s and the late 1980s. The operation consisted of an air strip that was oriented north-south on the land closest to 159th Avenue, a hangar for the fixed-wing aircraft along with fueling and maintenance facilities, a pesticide/herbicide mixing and storage area, and two burn areas. The former pesticide/herbicide mixing and storage area and burn areas were located in the area currently covered by the DEUR as depicted in **Figure 2**. The hangar, maintenance, and fueling facilities were located just west of the Moreland Properties parcel.

The parcel has been the subject of substantial prior investigations and remedial activities beginning in the mid-1980's, following a site inspection conducted by the Arizona Department of Environmental Quality (ADEQ) Hazardous Waste Operations Unit.

2.0 PROJECT OVERVIEW AND OBJECTIVES

As explained in the ensuing sections of this Work Plan, Moreland Properties acquired the subject property with the understanding that historical activities at the

Site had contributed to environmental conditions that restricted land uses. Specifically, arsenic and toxaphene contamination were present in shallow soils based on the former use of the Site as a crop dusting facility. The DEUR approved by ADEQ and recorded by the previous property owner identified residual concentrations of:

- **10 milligrams per kilogram (mg/kg) arsenic**, and
- **13 mg/kg toxaphene**

as representative of the maximum contaminant distribution at the Site, based on the statistically determined, upper-bound estimate derived from soil sampling results.[1] The DEUR was required based on the identified toxaphene impact to soils at concentrations that exceeded the residential SRL (5 mg/kg) established by ADEQ at that time and arsenic impact to soils at concentrations that equal the residential/non-residential SRL (10 mg/kg) established by ADEQ.

Recent site characterization work conducted by environmental consultants working on behalf of Moreland Properties has identified areas within the Site that contain higher than expected residual arsenic concentrations in soils. The arsenic concentrations in soils are above the non-residential SRL and substantially exceed the cleanup

1. As will be explained in more detail in this report, the 95% upper confidence limit (UCL) of the arithmetic mean of the soil sampling results is used to provide an upper bound estimate of the maximum contaminant distribution. The 95% UCL provides reasonable confidence that the true site average will not be underestimated.

criterion that was specified in the DEUR. The existing data indicate concentrations of:

- **35.5 mg/kg arsenic**, and
- **7.8 mg/kg toxaphene**

are representative of the existing, statistically defined maximum contaminant distribution at the Site.

To address the substantially more extensive arsenic contamination in the surficial and shallow subsurface soil at the Site, this Work Plan proposes to excavate and transport the most highly impacted soil to an offsite disposal facility. Other areas having lower level arsenic concentrations in the upper six inches of the surface soils will be removed and placed in the base of the excavation and the entire area covered by clean, imported fill material to restore the Site to the original grade. The planned soil removal action is intended to achieve concentrations of residual arsenic in surface and underlying soils that meet the applicable residential/non-residential SRL of 10 mg/kg, as specified in the DEUR.[2]

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2. In meeting the soil remediation levels, the residual arsenic levels at the Site are substantially below concentrations that may pose a threat to groundwater (e.g. the minimum Groundwater Protection Level for arsenic is 290 mg/kg). Toxaphene is a compound that is not a threat to groundwater quality due to its limited mobility in the subsurface (as indicated in *A Screening Method to Determine Soil Concentrations Protective of Groundwater Quality*, ADEQ Substantive Policy Statement 0144.000, prepared by the Leachability Working Group of the Cleanup Standards Task Force, September 1996).

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3.0 SUMMARY OF SITE INVESTIGATIONS AND REMEDIAL ACTIONS

Environmental investigations and remedial activities conducted at the Site occurred in two distinct cycles which will be discussed separately in this section. The initial work was conducted by environmental consulting firms representing GTRC and SunCor Development Corporation[3] that defined the extent of soil contamination specified in the DEUR. Subsequent site assessment work was conducted by environmental consultants working for Moreland Properties which identified higher residual arsenic soil contamination than determined by the previous property owners and is the basis for the proposed soil removal action in this Work Plan.

The site assessment work and corrective actions leading up to the ADEQ authorization and execution of a DEUR for the Site are briefly highlighted below. Summaries of referenced soil data and relevant consulting reports are contained in ADEQ files and are not reproduced in this Work Plan. Subsequent work done on behalf of Moreland Properties, which characterizes current conditions at the Site following the soil remediation conducted by the previous property owners, is reviewed in detail in this Work Plan, with the results of all sampling and analysis provided as appendices. The results of the additional site characterization work conducted by Moreland Properties demonstrates that the levels of residual arsenic soil

3. SunCor Development Corporation acquired land holdings in this area, including the Site and the former Marsh Aviation operations area to the west, from GTRC in October 2004.

contamination in surface soils at the Site are significantly higher than the upper bound estimates that were alleged in the DEUR.

3.1 Previous Site Characterization Work by Prior Property Owners

The earliest work at the Site, conducted from 1988 to 1995 to determine the nature of contamination and area of impact at the Site, is documented in:

- *Draft Site Investigation Report, Existing Marsh Aviation Site 1-2*, prepared by Dames and Moore and submitted to ADEQ in 1988;
- *Site Characterization and Sampling Plan* and *Site Characterization and Phase II Sampling Plan*, prepared by Pegler-Welch and submitted to ADEQ in 1988 and 1989, respectively;
- *Site Characterization and Phase II Sampling Plan Report*, prepared by Ameritec Environmental Services and submitted to ADEQ in 1989; and,
- *Cleanup Action Plan, Soil Remediation, Estrella Flying Services, Goodyear, Arizona*, prepared by PC Toxic and submitted to ADEQ in 1995.

These investigations included surface and subsurface soil sampling to determine the extent of contamination from pesticide and herbicide compounds. Over 145 sampling points were advanced to a maximum depth of 20 feet below ground surface (bgs) and sampled to delineate soil impacts

at the Site. The results of the early investigation work were reviewed by PC Toxic (1995) and identified three pesticides of concern at the Site, including toxaphene, dichlorodiphenyltrichloroethane (DDT), and Malathion. Toxaphene was the most prevalent pesticide found in soil samples with concentrations of up to 1,890 mg/kg reported. Concentrations of DDT and Malathion were detected at relatively low levels. Additionally, arsenic, a toxic herbicide, was reported in soil samples at concentrations up to 801 mg/kg. PC Toxic reported that the lateral and vertical extent of contaminant concentrations had not been adequately delineated and suggested that additional site characterization was needed.

Ogden Environmental and Energy Services conducted additional site-wide assessment of soil impacts in June 2000. The assessment was performed in accordance with a *Site Assessment Plan* (SAP) dated May 2000 and intended to identify the limits of contaminant impacts in soil for the stated purposes of Site characterization, human health risk assessment, remedial planning, and Site closure. Ogden collected and analyzed soil samples from 52 sampling locations, including five borings to a depth of 10 feet bgs. The selected soil sample locations were from areas where previous investigation identified the highest pesticide concentrations. The soil samples were submitted for chemical analysis of target pesticides and herbicides, including organochlorine compounds, by EPA Methods 8081A, 8141A, and 8151A, and for total arsenic, by EPA Method 6010B.

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The results of the June 2000 soil sampling and analyses are included in the April 2002 *Site Assessment Report and Corrective Action Plan* prepared by Haley & Aldrich. According to this report, only toxaphene and arsenic were found to exceed the 1997 then-established residential SRLs. Toxaphene reportedly occurred across the Site with a maximum reported concentration of 1,600 mg/kg, while arsenic was said to occur only in isolated locations at a concentration up to 801 mg/kg. The maximum toxaphene and arsenic concentrations were from soils at the former pesticide storage and mixing area. At the time of this investigation, the residential and non-residential SRLs for toxaphene were 4 and 17 mg/kg, respectively, whereas the residential and non-residential SRL for arsenic was 10 mg/kg.[4] The residential SRL for toxaphene has since been revised to 5 mg/kg, following revisions to the Soil Remediation rules in 2007. The residential and non-residential SRLs established for arsenic and the non-residential SRL for toxaphene remained unchanged in the 2007 rule making.

Based on a review of the available data, the maximum reported concentration of all other pesticide compounds detected at the Site, along with their respective 2007 residential SRLs, are as follows:

4. According to ADEQ rules, arsenic standards are not risk-based standards, but based on background.

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Pesticide Compound	Maximum Observed Concentration (mg/kg)	Residential Soil Remediation Level (mg/kg)
Diazinon	0.14	55
Dichloro-diphenyl-trichloro-ethane (DDT)	1.1	20
Dichloro-diphenyl-dichloro-ethylene (DDE)	2.0	20
Dichloro-diphenyl-dichloro-ethane (DDD)	0.88	28
Dichloromethane	0.112	93
Disulfoton	0.11	2.4
Endosulfan	24.3	370
Ethion	30.9	31
Ethyl parathion	74.5	370
Heptachlor epoxide	0.18	0.60
Methyl parathion	0.007	15
Malathion	0.15	1,200

Due to the fact that the maximum concentrations of the pesticide compounds listed above were less than the then-established 1997 residential SRLs, Haley & Aldrich determined that these chemicals did not pose a significant risk to public health and were not addressed as part of subsequent remedial actions.[5]

5. The maximum concentrations of the pesticides in this listing are also less than the residential SRLs in the revised 2007 soil remediation rule.

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3.2 Soil Remediation Conducted by Previous Property Owners

Haley & Aldrich developed a corrective action plan (CAP) to address the observed areas of elevated toxaphene and arsenic contamination at the Site. Site cleanup goals were established to be protective of human health in accordance with future land use at the Site, which was designated for non-residential/commercial land use. The CAP defined cleanup criteria by calculating the exposure point concentration for toxaphene and arsenic in areas of impact and determining the amount of soil that would need to be excavated to reduce the exposure point concentration to below the non-residential SRLs. The 95 percent upper confidence limit of the mean (95% UCL) of soil concentrations was calculated for each contaminant and used as the exposure point concentration.

The CAP identified 10 specific areas for excavation, seven of which were on-Site within the existing area covered by the DEUR. Four of the excavations covered larger areas, ranging from 3,050 to 10,350 square feet, located at the former pesticide storage and mixing area, burn area #1, burn area #2, and the northwestern operations area (see Figure 2). At each of these locations, soils were excavated to depths of 1 to 2 feet bgs, with sub-areas of the pesticide storage and mixing area and burn area #2 deepened to 7.5 feet and 5 feet bgs, respectively. Prior to excavation activities, Haley & Aldrich collected 38 additional soil samples to further delineate the vertical extent of toxaphene- or arsenic-impacted soils within the areas targeted for excavation. In retrospect, the additional soil

sampling appears to have adequately assessed the extent of toxaphene impact but was insufficient to appropriately define arsenic impacts.[6]

Excavation of the impacted soils was conducted in February and March 2003. A total of 4,100 tons of contaminated soil was excavated and stockpiled on-site. The stockpile was profiled for hazardous waste characteristics and transported to the Northwest Regional Landfill in Surprise, Arizona for disposal as a non-hazardous waste. Approximately 4,200 tons of backfill material was imported to the Site to fill the excavations. The imported soil was pre-screened for previous land use and analyzed for soil contamination to ensure the soils were acceptable as clean fill.

Based on the results of the site characterization work conducted, and confirmation samples obtained following the soil removal action, Goodyear recorded a DEUR indicating the maximum concentrations of toxaphene and arsenic present at the Site were 13 mg/kg and 10 mg/kg, respectively. In representing the environmental contaminant information for the Site, the maximum concentration is indicated to be the 95% UCL of the mean concentration of the site-specific contaminant distribution. A DEUR was necessary due to the presence of toxaphene contamination exceeding the residential SRL. Although it was stated that only a limited portion of the Site contained concentrations of toxaphene that exceeded the residential

6. 36 of the 38 samples were analyzed for toxaphene contamination while only 4 of the 38 samples were analyzed for arsenic.

SRL after remediation, the DEUR included the entire Site. ADEQ authorized the DEUR in August 2004.[7]

3.3 Recent Site Characterization Work Conducted by Moreland Properties

Moreland Properties acquired the Site in 2010 and conducted an initial site assessment based on their potential interest of pursuing removal of the DEUR from the property. The site assessment work was conducted by Western Technologies, Inc. in 2014. The results of the site assessment indicated that residual concentrations of arsenic were widely present in soils at the Site at levels that exceeded the environmental contaminant concentrations specified in the DEUR. Later in 2017, Synergy Environmental LLC (Synergy) expanded sampling and analysis of surface and subsurface soils across the Site to determine the necessary remediation to restore the Site to the environmental contaminant concentrations specified in the DEUR.

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7. The DEUR originally encompassed approximately 1.5 acres of land to the west of the Site that was part of the former Marsh Aviation operational area. Although the land was planned for residential development, SunCor Development Company inadvertently included this land in the DEUR as a result of a survey and engineering design error. SunCor subsequently submitted a DEUR Amendment to ADEQ to remove the DEUR for this western parcel after conducting further work to remove soils from areas containing arsenic and/or toxaphene at concentrations exceeding their respective residential SRLs. ADEQ authorized the modification to the DEUR for unrestricted use of the western property parcel in 2009. Seven residential lots were subsequently developed on the land removed from the DEUR.

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3.3.1 2014 Site Assessment Conducted by Western Technologies, Inc.

Western Technologies, Inc. (WTI) conducted soil sampling with two objectives: 1) to characterize general conditions of surficial soils at the Site by uniformly sampling locations throughout the Site laid out on a grid, and 2) to evaluate residual levels of soil contaminants that surround and underlay the previous remedial excavations of source areas associated with the CAP conducted by Haley & Aldrich on behalf of a previous property owner. The sampling activity resulted in the collection of 58 soil samples associated with both the "grid samples" and "source area samples", as explained further in the discussion that follows.

The field sampling was conducted in November 2014 and summarized in a WTI Report dated January 14, 2015. A copy of the text, tables, and figures included in this WTI Report is provided as **Attachment 1** to this Work Plan.[8] The attached report documents the sample plan and rationale and describes the sampling methodology. The samples were analyzed for organochlorine pesticides using EPA Method 8081 and for total arsenic by EPA Method 6010B.

To characterize general Site conditions, a total of 32 soil samples were obtained at 21 sample locations that were

8. A copy of the full 184-page report, entitled *Environmental Consulting Services, Declaration of Environmental Use Restriction Release, Pre-VRP Entry Soil Sampling and Testing, Former New Marsh Aviation, NWC McDowell Road and 159th Avenue, Goodyear, Arizona 85395*, is provided in Attachment 1 on the electronic file copy of this Work Plan.

on a grid with dimensions of approximately 60 by 65 feet, established to evenly distribute the sample locations within the Site. Samples of surficial soil were obtained from the 3- to 6-inch depth interval at these locations. At five of the grid sample locations, additional soil samples were obtained from the 1- to 3-inch depth interval and from the 9- to 12-inch depth interval to provide a cursory evaluation of the vertical soil profile. The grid samples were identified with the letters "HS-" and a number indicating their map location, followed by the number indicating the depth of the sample in inches bgs.

The grid sample analytical results are provided in Table 2 and the sample locations and reported toxaphene and arsenic concentrations are shown in Figures 4 and 5 of the WTI Report. Results of the laboratory analysis of grid samples indicated the following ranges of measured contaminant concentrations:

Arsenic:	3.9 to 550 mg/kg; with an average of 55.7 mg/kg
Toxaphene:	<0.40 to 280 mg/kg; with an average of 13.6 mg/kg
DDE:	<0.020 to 2.5 mg/kg; with an average of 0.51 mg/kg[9]

No other analytes were reported exceeding their respective method reporting limits in the grid soil samples analyzed.

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9. The observed DDE concentrations in soils are less than the residential SRL of 20 mg/kg for DDE.

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To verify remedial action effectiveness in the source areas that were excavated as part of the previous soil removal action, a total of 26 source area samples were collected in the area surrounding and in soils underlying the four largest excavations on the Site (the former pesticide storage and mixing area, burn area #1, burn area #2, and northwestern operations area). The source area samples were identified with the letter "S-" and a number indicating the map location, followed by a number indicating the depth in feet bgs.

The source area sample analytical results are provided in Table 3 and the sample locations and reported toxaphene and arsenic concentrations are shown in Figures 6 and 7 of the WTI Report. Results of the laboratory analysis of the source area samples indicated the following ranges of soil concentrations:

Arsenic:	2.4 to 170 mg/kg; with an average of 45.2 mg/kg
Toxaphene:	<0.40 to 26 mg/kg; with an average of 2.9 mg/kg
DDE:	<0.020 to 1.5 mg/kg; with an average of 0.38 mg/kg

Other than chlordane observed in one sample (S-3-8.0) at a reported concentration of 0.73 mg/kg, no other analytes were reported exceeding their respective method reporting limits in the source area soil samples analyzed.[10]

10. Chlordane has a residential SRL of 19 mg/kg.

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3.3.2 2017 Site Assessment Conducted by Synergy Environmental

Synergy was contracted by Moreland Properties in 2017 to review the WTI data and assess remedial approaches to address residual concentrations of arsenic and toxaphene at the Site that exceeded the environmental contaminant concentrations specified in the DEUR. While significant work has been conducted at this Site, additional work was recommended by Synergy to fill in data gaps and assess existing conditions with respect to the documented environmental contaminant levels specified in the DEUR. Synergy was also asked to analyze the potential for modification of the DEUR with site-specific remediation levels consistent with the intended use and advise the client regarding further remedial actions needed to address arsenic concentrations present in residual soils at the Site that exceed the environmental contaminant concentrations specified in the DEUR.

On behalf of Moreland Properties, Synergy prepared and implemented a focused field sampling plan to allow for further refinement of the vertical and horizontal extent of arsenic and toxaphene concentrations at locations where contaminant levels were above those specified in the DEUR.

To further refine the extent of soils exceeding the remediation levels specified in the DEUR, a two-fold sampling approach was implemented. This two-fold approach first involved horizontal and vertical sampling and analysis of targeted areas to fill in data gaps and

provide confirmation of prior investigative results. As this remedial refinement sampling progressed, additional data gaps became apparent resulting in the need for a second phase of sampling in order to support the subsequent development of the soil removal action outlined in the Work Plan.

The field sampling was conducted on September 5 and 6, 2017, with supplemental sampling on October 23, 2017, and is summarized in a Synergy report dated December 1, 2017. A copy of the text, tables, and figures included in this report is provided as **Attachment 2** to this Work Plan.[11] The attached report file documents the sample plan and rationale and describes the sampling methodology. The samples were analyzed for organochlorine pesticides using EPA Method 8081 and for total arsenic by EPA Method 6010B.

The field activity resulted in the collection of 64 soil samples associated with both the surface and subsurface refinement sampling. The results of arsenic and toxaphene analyses are provided in Tables 1 and 2, respectively, and are collectively depicted on Figure 2 of the Synergy report.

Results of the laboratory analysis of the remedial refinement samples indicated the following ranges of soil concentrations:

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11. A copy of the full 140-page report, entitled, *Remedial Refinement Sampling Report, NWC McDowell Road and 159th Avenue, Goodyear, Arizona*, is provided in Attachment 2 on the electronic file copy of this Work Plan.

Arsenic:	5.05 to 135 mg/kg; with an average of 20.5 mg/kg
Toxaphene:	<0.40 to 20.5 mg/kg; with an average of 1.7 mg/kg

In addition, the pesticide compound DDE was reported in seven samples ranging from 0.0225 to 0.157 mg/kg, with an average of 0.076 mg/kg; the pesticide compound DDD was found in a single sample at a concentrations of 0.0312 mg/kg; and the pesticide compound DDT was also found in a single sample at a concentration of 0.0590 mg/kg. The reported levels of the DDE, DDD, and DDT compounds are significantly less than their respective residential SRLs of 20, 28, and 20 mg/kg.

4.0 SUMMARY OF EXISTING CONDITIONS AT THE SITE

Recent site characterization work conducted by environmental consultants working on behalf of Moreland Properties has identified substantial areas within the Site that contain residual arsenic concentrations in soils that are above the remediation levels specified in the DEUR. In the case of arsenic, soil concentrations substantially exceed the cleanup criteria that was specified in the DEUR obtained by the previous property owner. In particular, the prior property owners filed and recorded a DEUR in 2004 which identified residual concentrations of:

- **10 mg/kg arsenic**, and
- **13 mg/kg toxaphene**

based on the statistically determined, upper-bound estimate, which is considered to be representative of the maximum contaminant distribution at the Site.[12]

The work done to evaluate existing conditions following Moreland Properties' acquisition of the Site confirms that arsenic and toxaphene are the primary contaminants of concern at the Site and substantiates that no other pesticide compounds were found at concentrations exceeding even residential SRLs. Additionally, the recent sampling and analysis conducted by Moreland Properties indicates that arsenic is present in soils at the Site at significantly higher levels than were reported by the previous property owner and that were specified as the upper bound contaminant concentration in the DEUR approved by ADEQ. In fact, based on the analysis of arsenic concentration in over 100 soil samples obtained at 50 sample locations, as shown in **Figure 3**, from the recent site investigatory work, 14 locations had arsenic concentrations greater than 50 mg/kg.

The results from soil sampling and analysis conducted in the 2014 and 2017 site characterization studies are depicted in **Figure 4** and listed in **Table 1**. Arsenic is found at concentrations ranging from 2.4 to 550 mg/kg

12. Additionally, as it concerns the analysis of toxaphene impacts, the Haley & Aldrich technical evaluation used to determine exposure point concentrations for the planned soil remedial actions factored in lower toxaphene concentrations than were actually measured at the Site in the earlier site investigatory work, by assuming the toxaphene in soil is reduced over time by natural biodegradation based on a half-life of 11 years.

throughout the Site and exceed the nonresidential SRL in a large portion of the central site extending from the northern to southern Site boundaries. The vertical extent of impact was determined by collecting soil samples at discrete depths using a GeoProbe direct push rig to delineate the subsurface concentrations and is generally limited to a maximum of five feet bgs.

Two regions in the central Site have the highest reported arsenic concentrations, including the area encompassing sample locations HS-3 and HS-6 to the north and the region extending from the former pesticide storage and mixing area to the southern Site boundary.

- The northern area of impact has arsenic concentrations up to 550 mg/kg in the surface soils (to a depth of six inches), but much reduced concentrations in underlying soils. The extent of impact is generally limited to two feet bgs, or less, as defined by depth discrete soil samples obtained at five vertical boreholes advanced to five feet bgs.
- The southern area of impact has arsenic concentrations up to 220 mg/kg reported in surface soils (to a depth of six inches), with reduced concentrations in underlying soils. The extent of impact is generally limited to four feet bgs, or less, as defined by depth discrete soil samples obtained at eight vertical boreholes advanced to a depth of five to ten feet bgs.

Toxaphene is found at elevated concentrations in more localized parts of the Site, primarily in the vicinity of the former pesticide storage and mixing area.

Based on this data set and utilizing the same methodology to derive the statistically determined, upper-bound estimate of residual soil contamination at the Site, the existing data indicate concentrations of:

- **35.5 mg/kg arsenic**, and
- **7.8 mg/kg toxaphene**

are representative of the existing maximum contaminant distribution at the Site. An explanation of the methodology and calculations used to derive these upper bound estimates is as follows.

The upper bound estimate of the maximum contaminant distribution is based on U.S. EPA risk assessment methods developed for exposure posed by uncontrolled releases of hazardous substances. In general, the risk assessment guidance applies statistical analysis to estimate the concentration of potential exposure to contaminants of concern because of the uncertainty associated with estimating true average concentrations due to limited data at Superfund sites.[13] The 95% upper confidence limit of the arithmetic mean is used to provide an upper bound estimate of the maximum contaminant distribution. The 95% UCL of a mean is defined as a value that, when calculated repeatedly for random data subsets of site data, equals or exceeds the true mean 95 percent of the time.

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13. See *Supplemental Guidance to RAGS: Calculating the Concentration Term*, prepared by EPA Office of Solid Waste Management and Emergency Response, Publication 9285.7-081, May 1992.

The 95% UCL provides reasonable confidence that the true site average will not be underestimated.

The 95% UCL of the average arsenic and toxaphene concentrations was estimated for the data set in **Table 1** using parametric and nonparametric statistics as determined to be appropriate based on the data set distribution. As indicated by statistical parameters such as measures of the skewness and kurtosis shown in **Table 1**, and review of a frequency plot of the data, the dataset is not normally distributed and was evaluated as a nonparametric, or lognormal, distribution.[14] On this basis, the data are transformed by using the natural logarithm function and the 95% UCL is calculated by standard equation for a lognormal distribution. A frequency plot of the lognormal data and the data used to calculate 95% UCL of the average concentration of arsenic and toxaphene in existing soils at the Site is given in **Tables 2 and 3** of this Work Plan, respectively.

5.0 CLEANUP CRITERIA FOR SOIL REMEDIATION

Based on analysis of the extensive site characterization work conducted at the Site, Moreland Properties proposes to reduce the residual arsenic soil contamination at the Site by a focused removal action designed to restore conditions

14. As referenced in Microsoft Excel, kurtosis is an indicator of the peakness or flatness of the sample distribution relative to normality and the skewness indicates the degree of asymmetry of the data set around the mean regardless of fit to the normal distribution. The values of skewness and kurtosis should be close to zero for data to follow a normal distribution.

at the Site to meet the environmental contaminant concentrations specified in the DEUR. Specifically, the focused removal action will address the existing residual arsenic soil contamination at the Site calculated at the 95% UCL to be **35.5 mg/kg arsenic** by excavation and removal of contaminated soils from the areas of impact having higher arsenic concentrations in order to reduce the contaminant concentrations to less than **10 mg/kg arsenic** in the remaining shallow soils at the Site and achieve the environmental contaminant concentrations specified in the DEUR.

Although the soil removal action is targeted to address the residual arsenic contamination, it will similarly reduce toxaphene levels in soil due to the fact that the isolated areas of elevated toxaphene levels tend to coincide with areas of arsenic impact. As a result, the toxaphene levels in soil will be reduced from 7.8 mg/kg to below 5.0 mg/kg.

6.0 DEVELOPMENT OF PLANNED SOIL REMOVAL ACTION

The areas designated for focused soil removal were based on an analysis and extrapolation of the lateral and vertical magnitude and trends of arsenic concentrations in 106 soil samples obtained at 50 sample locations from the 2014 and 2017 sampling events. On this basis, the areas of impacted soils were defined and evaluated to delimit the targeted areas for soil removal. The net result of this evaluation was an iterative process to optimally plan for the appropriate excavation of contaminated soils to reduce the resulting arsenic concentration in residual

soils to achieve the cleanup criteria of 10 mg/kg specified in the ADEQ-approved DEUR. A detailed summary of the sample locations, depth intervals, and contaminant concentrations associated with all soil sampling data, along with the planned response action and disposition of affected soils are specified in **Table 4**.

Synergy utilized AutoCAD Civil 3D (Version 2018) to model the vertical and horizontal extent of soils targeted for excavation. This modeling tool was used to estimate the approximate volume of impacted soils within defined areas of impact to assist in subsequent development of focused cost estimate for subsequent site remediation. The method for model development assumed that the site is level, which is consistent with observed site conditions. Depth and contaminant concentration data were entered at each sampling location as well as field-derived boundary conditions. These data were interpolated using embedded algorithms to create an excavation surface. This excavation surface was then plotted using increments of equal elevation to generate excavation contours and calculate grading volumes.

Based on this evaluation, two principal areas will be addressed by the focused soil removal action. These areas are shown in **Figure 5** and include a Primary Area of Impact (AOI), outlined by the red-dashed line, and the peripheral areas extending to east and west in the remaining area covered by the DEUR.

The Primary AOI covers more than 1.5 acres and contains the highest concentrations of arsenic (and

toxaphene) found in soils at the Site, including impacted soils extending up to four feet below grade. The dataset given in **Table 5** indicates all sample locations and depth intervals designated as the Primary AOI. The 95% UCL of the arithmetic average of arsenic and toxaphene concentration represented by all soil sample locations and depth intervals in the Primary AOI is calculated as:

- **113.9 mg/kg for arsenic**, and
- **32.1 mg/kg for toxaphene.**

A frequency plot of the lognormal data distribution and the metrics used to calculate the 95% UCL of the average arsenic and toxaphene concentrations within the Primary AOI is given in **Tables 6 and 7**, respectively. Impacted soils from the Primary AOI will be excavated and transported to an off-site disposal facility.

The remaining portions of the property extending east and west of the Primary AOI that are within the area covered by the DEUR contain significantly lower concentrations of arsenic (and toxaphene), with the extent of impact generally limited to soils in the upper six inches. In fact, over half of land area within these peripheral areas contains arsenic concentrations that are uniformly below the standards in the DEUR. The sample locations and depth intervals within these peripheral areas are highlighted in yellow in **Table 4** and indicate arsenic is found at concentrations ranging from 5 to 17 mg/kg in the surficial soils. Impacted soils from these peripheral areas will be excavated to a minimum depth of six inches below grade and placed in the base of the Primary AOI

excavation. Removal of all surficial soil within these peripheral areas will be conducted as a cautionary step based on our current understanding that site conditions were not adequately characterized by prior soil sampling activities.

Following excavation and disposition of impacted soils from the Primary AOI and surrounding peripheral areas, clean fill material will be imported to the Site to place in these excavated areas and restore the grade. The resulting cover of clean fill will ensure that all surface soils to a depth of six inches at the Site do not contain arsenic compounds from past pesticide usage above the arsenic non-residential SRL (10 mg/kg) specified in the ADEQ-approved DEUR.

Table 8 summarizes the arsenic and toxaphene concentrations in the residuals soils that will remain at the Property, *prior to importing clean fill material* for placement within the excavated areas. The calculated 95% UCL of average arsenic and toxaphene concentrations in soil remaining in place is calculated to be:

- **9.8 mg/kg for arsenic**, and
- **3.8 mg/kg for toxaphene**

A frequency plot of the data range and the metrics used to calculate the 95% UCL of the average arsenic and toxaphene concentrations within the Primary AOI is given in **Tables 9 and 10**, respectively, assuming a lognormal data distribution. Realizing that naturally-occurring arsenic is detected in all samples and may be more

normally distributed at the lower observed concentrations in this data set, the 95% UCL of the average arsenic concentration was also calculated for a normal data distribution. A frequency plot of the data distribution and the metrics used to calculate the 95% UCL of the average arsenic concentrations within the Primary AOI, assuming normal data distribution, is given in **Table 11**. In this case it is interesting to note, the calculated 95% UCL of the arithmetic average of arsenic concentrations produces essentially the same value:

Assumed Distribution:	Normal	Lognormal
Test Statistic:	Student-t	H-statistic
95% UCL (mg/kg):	9.797	9.830

indicating the distribution functions are similar in nature. In both cases, the statistical tests derive the same upper bound estimate of 9.8 mg/kg.

As a final note, it is important to stress the upper bound estimate of residual arsenic and toxaphene concentrations identified above is an overestimation of the actual levels of these contaminants that will be present in the surface and shallow sub surface soils following the removal action. The derivation of residual arsenic and toxaphene concentrations does ***not*** factor in the placement of an estimated 2,500 cubic yards of clean fill material in the upper soil interval. Consequently, the resulting bulk concentrations of arsenic and toxaphene in the surface and subsurface soils will be substantially less than the upper bound estimates.

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7.0 SUMMARY OF PLANNED SOIL REMOVAL ACTION

Upon approval by ADEQ, Moreland Properties will initiate the proposed soil removal action at the Site. Implementation of this work includes:

- Site preparation and pre-remediation activities
- Excavation of the area of previous clean fill at Primary AOI
- Excavation of soils within the Primary AOI for off-site disposal
- Excavation of soils peripheral to the Primary AOI for on-site use as fill
- Importation of clean fill and site restoration
- Post-remediation activities

A summary of these tasks is provided below. Kary Environmental Services, Inc. (KES) of Mesa, Arizona will conduct the soil removal action under Synergy oversight.

7.1 Site Preparation and Pre-Remediation Activities

Site preparation for the planned remedial actions will entail the following specific activities: 1) procure necessary city and county permits and approvals, 2) profile soils in Primary AOI for waste disposal, 3) generate site-specific health and safety plan, 4) provide general public notice of soil removal action, 5) prepare the Site for soil excavation and off-site disposal, and 6) survey and delineate areas and depths of excavations.

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7.1.1 Procure Necessary Permits and Approvals

In addition to obtaining ADEQ approval, the planned work requires a dust control permit from Maricopa County and coordination and approval by the City of Goodyear to address truck routing, excavation and grading for stormwater management, and the source of and water supply for dust control. KES will procure the necessary permits and approvals.

7.1.2 Profile Soils for Waste Disposal

Presuming that the soils excavated from the Primary AOI are a non-hazardous waste, the soils will be transported to the Republic Services Southwest Regional Landfill in Buckeye, Arizona for waste disposal.[15] Consistent with arrangements reached with Republic Services, waste profiling will be conducted in-situ, prior to excavation, to streamline the soil removal action and enable off-site disposal without on-site accumulation of contaminated soil that might contribute to additional potential on-site worker or off-site public exposure during the Site work.

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15. Prior soil remediation activities documented in the Haley & Aldrich *Final Corrective Action Report* (2003) indicated higher arsenic and toxaphene concentrations were present in soils excavated during the previous soil remedial action than are presently found in residual soils at the Property. Waste profiling conducting during the previous remedial actions indicating the excavated soils did not exhibit the characteristics of a hazardous waste.

Appendix E

Synergy will work with the waste coordinator at Republic Services to appropriately profile the soils for disposal, in accordance with the disposal facility requirements, prior to excavation activities. Waste profiling will entail the collection of four samples within the area targeted for off-site waste disposal. To ensure representatives samples are obtained, each sample will be collected from 15 individual sub-samples obtained at 20-foot intervals along linear transects of the Primary AOL Two of the transects will run north-south and two will be oriented east-west across the Primary AOI. The individual sub-samples along each transect will be taken at a depth of six inches (where the highest pesticide concentrations have been observed). The 15 sub-samples obtained along each transect will by combined in equal proportions and uniformly mixed to yield a single composite sample for waste characterization,

Each of the composite samples will be analyzed for the total arsenic concentration by EPA Test Method 6010 and total toxaphene concentration and other pesticide and herbicide compounds by EPA Test Method 8080. Additionally, in accordance with Republic Services' requirements, the samples will be analyzed for the following constituents by the Toxicity Characteristics Leaching Procedure (TCLP) pursuant to EPA Test Methods for Evaluating Solid Waste (SW-846 Test Method 1311). The TCLP extracts will be analyzed for:

- TCLP Metals by EPA Method 6010
- TCLP Volatile Organic Compounds by EPA Method 8260

- TCLP Semi-Volatiles (Acid and Base Neutral Compounds) by EPA Method 8270
- TCLP Herbicides and Pesticides by EPA Method 8080

Site work will not begin until Republic Services has accepted and approved the waste profile and assigned a unique waste identification number for tracking of solid waste material generated at the Site. Should the results of TCLP analyses of samples within the Site result in a concentration of 5 milligrams per liter (mg/L) for arsenic or 0.5 mg/L for toxaphene, or exceed Resource Conservation Recovery Act levels for classification as a hazardous waste for any other constituents, then this Work Plan will be amended to incorporate provisions for stockpiling the excavated soils and rigorous procedures to sample and characterize the waste materials for appropriate waste disposal.

7.1.3 Generate Site-specific Health and Safety Plan (HASP)

KES will prepare a site-specific HASP to cover the work requirements of the soil removal action. The HASP will ensure that field activities comply with City and County requirements for dust control and require an assigned supervisor with dust control training to be present at all times, to mitigate potential air inhalation hazard from windborne particulate matter. All individuals conducting field activities will have successfully completed the 40-hour HAZWOPPER training and annual 8-hour refresher training (as applicable) as specified by the

Occupational Safety and Health Act (29 CFR 1910.120) and will be thoroughly familiar with the HASP. The site field manager will be the acting Health and Safety Office. Heavy equipment operators must also show appropriate training for the equipment they operate.

The HASP will be attached to the final ADEQ-approved version of this Work Plan.

7.1.4 Provide General Public Notice of Soil Removal Action

Synergy will ensure the general public is informed of the soil removal action by notifying those homeowners within 500 feet of the Site of the work to be conducted. Notification will be in the form of direct mailing, door hangings, or a similar form of notice that describes the planned soil removal action, estimated schedule and work hours, and name and contact information for further information regarding the field work or site conditions. Additionally, a sign will be installed at the Site providing the same or similar information. A log of any public inquiries and follow up responses will be maintained in the project file and provided to ADEQ in the project closure report.

7.1.5 Prepare the Site for Soil Excavation and Off-Site Disposal

In the lead up to implementation of the soil removal action, KES will install temporary fencing around the perimeter, erect a water tank and/or connect to a water supply source, provide a portable toilet, and define and

establish work zones defined by the HASP. Work zones will be based on pre-planning to manage heavy equipment operations and traffic within the perimeter of the fenced Site and include the Exclusion Zone where remediation work is being conducted, the Contamination Reduction Zone for decontamination and equipment storage area, and a Support Zone (or clean zone). The decontamination area will consist of a track-out pad and decontamination area for trucks brought on Site for loading and off-site transport of excavated soils. The decontamination pad will be constructed within a bermed area covered by two sheets of heavy gauge, high-density polyethylene.

7.1.6 Survey and Delineate Areas and Depths of Soil Excavation

To guide precise and efficient soil removal, a land surveyor will establish coordinates and elevation control utilizing a City of Goodyear datum and survey the Site to delineate areas targeted for excavations and determine specific excavation depths in the Primary and Peripheral AOIs. Initially, the external boundaries of the areas designated for excavation at the Site will be delineated on the ground and marked with stakes.

7.2 Excavation of the Area of Previous Clean Fill at the Primary AOI

As shown in **Figure 6**, approximately half of the land area at the former pesticide storage and mixing location was excavated during the previous soil remediation work to remove contaminated soils and backfilled with

clean imported fill. Work done by WTI in their 2014 site characterization activity (see Attachment 1, page 6) indicated that the imported soil used to fill the remedial excavation in this area is distinguishable from native soils. The import materials consist of reddish brown silty sand that differs in composition and structure from native soils which are more tan-colored, compact, and slightly calcified.

Synergy will generally locate the area of previous clean fill in the former pesticide storage and mixing area by the use of mapping and then pothole the ground to depths of about one foot to establish the boundaries of the area designated for excavation of these imported soils. Excavation will be conducted to a depth of up to one-foot bgs, based on observed soil characteristics. According to AutoCAD modeling, the previous clean fill amounts to approximately 100 cubic yards (or around 150 tons)[16] and this material will be stockpiled on Site for later use as fill material in the base of the Primary AOI excavation.

7.3 Excavation of Soils within the Primary AOI for Off-Site Disposal

KES will excavate the impacted soils from the Primary AOI in accordance with the excavation plan shown in **Figure 7**. Initially, the Primary AOI will be excavated to a minimum depth of six inches over the entire area. Following the initial cut, the land surveyor will stake the perimeter and depths of excavations planned to

16. Assuming a cubic yard of soil weighs 1.5 tons.

remove impacted soils to a depth of two feet bgs in the northern section and up to four feet bgs in the southern section, following the excavation contours in **Figure 7**. Based on the planned depths of excavation derived from AutoCad modeling, an estimated 2,400 cubic yards (or approximately 3,600 tons) of impacted soil will be removed from the Primary AOI. A final survey of the excavation surface will be conducted to ensure impacted soils were removed to the prescribed depths at all vertical boring sample locations.

As soil is excavated, it will be placed in dump trucks for off-site disposal. A licensed waste management company will provide the transportation and disposal of the generated soil waste. Wastes materials will be transported to the disposal facility under a waste manifest and bill of lading. Waste profiles and applicable certification forms will be completed and signed by the generator. Proper shipping documents will accompany the wastes and copies of the manifests will be included in the project closeout report.

7.4 Excavation of Soils in the Peripheral Area for On-Site Use as Fill

Once excavation of the Primary AOI is complete, the soil extending east and west of this excavation in all areas covered by the DEUR will be scraped from the ground surface to a depth of at least six inches for subsequent emplacement in the base of the Primary AOI excavation in the southern section. Based on AutoCad modeling, a minimum 2,100 cubic yards (or approximately 3,150 tons) of impacted soil will be removed from the peripheral areas

and used on Site as fill material. A final land survey of the excavation surface will be conducted to ensure impacted soils were removed to a minimum depth of six inches throughout this area.

7.5 Importation of Clean Fill and Site Restoration

Upon completion of the excavation activities, including emplacement of soils from the Peripheral AOI in the Primary AOI excavation, approximately 2,500 cubic yards (about 3,750 tons) of clean fill material will be transported to the Site to backfill all excavated areas and restore the grade to its original elevation. Prior to importation of the fill material, the import soil source will be reviewed for potential hazardous materials impacts. If no history of soil contamination or release of hazardous substances are identified, four composite soil samples will be collected from the soil source area and submitted to a laboratory for organochlorine pesticides analysis by EPA Method 8080 and arsenic analysis by EPA Method 6010. If the laboratory results are less than 10 mg/kg for arsenic and 2.5 mg/kg for toxaphene, the import soil source will be accepted for use as fill and cover material at the Site.

7.6 Post Remediation Activities

Following completion of the soil removal action and Site restoration, contractor equipment will be decontaminated and removed from the Site, along with all other materials and equipment brought in for the fieldwork. Decontamination water and sediments will be collected in 55-gallon Department of Transportation drums,

labeled appropriately, and stored within a plastic-lined accumulation area within the fenced work site. The investigation derived waste (IDW) solids and/or liquids stored on Site will be characterized at the completion of fieldwork for proper disposal.

Synergy will prepare a remedial action closure report to document the soil removal action that will include the following information:

- Summary and timeline of Site remedial activities
- Description of any variance from the approved soil removal action work plan
- Records of any contacts from or communication with the general public
- Maps illustrating the surveyed limits and depths of excavation in the Primary AOI and peripheral area covered by the DEUR
- Summary of the mass of soil removed and transported off Site for disposal
- Photographic documentation of the main work activities and completed excavations of the Primary and Peripheral AOIs and final Site grading and restoration
- Summary and results of waste characterization for off-site disposal
- Copies of laboratory analytical reports
- Copies of waste manifests for contaminated soils that were excavated and transported off Site for disposal

- An Arizona registered professional's statement regarding the completion of site remedial activities
- Request for Site closure and no further action
- Owner's certification

The closure report will be submitted to ADEQ approximately 60 days following completion of the soil removal action.

8.0 SCHEDULE

Synergy will provide the proposed work breakdown structure and tentative timeline for the major elements of the soil removal action within 10 days of ADEQ approval of this Work Plan.

9.0 REFERENCES

Ameritec Environmental Services, 1989. *Site Characterization and Phase II Sampling Plan Report.*

Dames and Moore, 1988. *Draft Site Investigation Report, Existing Marsh Aviation Site 1-2.*

Environmental Protection Agency, 1992. *Supplemental Guidance to RAGS: Calculating the Concentration Term*, Office of Solid Waste Management and Emergency Response, Publication 9285.7-081, May 1992.

Appendix E

Gilbert, Richard O., 1987. *Statistical Methods for Environmental Pollution Monitoring*, published by Van Nostrand Reinhold Company Inc., New York, New York.

Haley & Aldrich, 2002. *Site Assessment Report and Corrective Action Plan, New Marsh Aviation Site, Goodyear, Arizona*, April 2002.

_____, 2003. *Final Corrective Action Report, New Marsh Aviation Site, Goodyear, Arizona,* October 9, 2003.

Ogden Environmental and Energy Services, 2000. *Site Assessment Plan for New Marsh Aviation Services, Inc.*, May 12, 2000.

PC Toxic, 1995. *Cleanup Action Plan, Soil Remediation, Estrella Flying Services, Goodyear, Arizona.*

Pegler-Welch, 1988. *Site Characterization and Sampling Plan.*

_____, 1989. *Site Characterization and Phase II Sampling Plan.*

Synergy Environmental, 2017. *Remedial Refinement Sampling Report, NWC McDowell Road and 159th Avenue, Goodyear, Arizona*, December 1, 2017.

Western Technologies, 2015. *Environmental Consulting Services, Declaration of Environmental Use Restriction Release, Pre-VRP Entry Soil Sampling and Testing, Former New Marsh Aviation, NWC McDowell Road and 159th Avenue, Goodyear, Arizona 85395*, January 14, 2015.

APPENDIX F — ADEQ APPROVAL OF MORELAND'S WORK PLAN, DATED SEPTEMBER 30, 2019

From: Kimball III, David P.
Sent: Monday, September 30, 2019 10:33 AM
To: Kimball, Stuart S.
Subject: FW: Marsh Moreland site Work Plan Review
Follow Up Flag: FollowUp
Flag Status: Flagged

From: Scott Green [mailto:green.scott@azdeq.gov]
Sent: Monday, September 30, 2019 8:41 AM
To: Kimball III, David P. <DPK@gknet.com>
Cc: Laura Malone <malone.laura@azdeq.gov>, Joey Pace <pace.joey@azdeq.gov>, Caitlin Burwell <burwell.caitlin@azdeq.gov>
Subject: Marsh Moreland site Work Plan Review

David:

ADEQ has reviewed the *Removal Action to Address Residual Arsenic Contamination in Shallow Soils at the Former Marsh Aviation Site,* prepared by SYNERGY Environmental LLC, on behalf of Moreland Properties LLC. The proposal to remediate the property through excavation, which will reduce concentrations of arsenic and toxaphene, thereby bringing concentrations in compliance with the concentrations cited in the existing Declaration of Environmental Use Restriction (DEUR). is hereby approved. The calculation of a 95% Upper Confidence limit to determine concentrations are in

compliance with the concentrations identified in the DEUR is also approved.

Regards,

Scott R. Green, RG
Manager, Remedial Projects Unit
Waste Programs Division
Ph: 602-771-1612
azdeq.gov

APPENDIX G — ADEQ CONFIRMATION OF MORELAND'S COMPLIANCE WITH SETTLEMENT AGREEMENT, DATED OCTOBER 22, 2020

From: Laura Malone <malone.laura@azdeq.gov>
Sent: Thursday, October 22, 2020 3:47 PM
To: Kimball, Stuart S. <stuart.kimball@gknet.com>
Cc: Zeiss, Rick <Rick.Zeise@azag.gov>
Subject: Re: Moreland-Marsh

Mr. Kimball,

The Administrative Settlement Agreement called for Moreland Properties L.L.C. to prepare and implement a remedial action plan to address the soil contamination at the Moreland property site. ADEQ previously approved the remedial action plan and Synergy submitted documentation in support of completion of the work which has become part of the public record. If future data confirms that Moreland Properties has failed to satisfy any material obligation under the agreement, ADEQ has the option to void this agreement. ADEQ confirms that Moreland Properties L.L.C. has complied with its obligations under the settlement agreement, with the understanding that there are ongoing obligations for access to the property and corporate records if necessary.

Sincerely,

Laura L. Malone

Laura L. Malone
Director, Waste Programs Division
Ph: 602-771-4567
azdeq.gov

APPENDIX H — EXCERPTS OF ADEQ TRIAL TESTIMONY, DATED MARCH 28, 2023

UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF ARIZONA

NO. 2:20-cv-02297-SRB

MORELAND PROPERTIES, LLC,

Plaintiff,

v.

THE GOODYEAR TIRE & RUBBER COMPANY, *et al.*,

Defendants.

Phoenix, Arizona
March 28, 2023

BEFORE: THE HONORABLE SUSAN R. BOLTON, JUDGE

REPORTER'S TRANSCRIPT OF PROCEEDINGS

EXCERPTED TESTIMONY OF LAURA MALONE

Trial Day 1

Official Court Reporter:
Teri Veres, RMR, CRR
Sandra Day O'Connor U.S. Courthouse, Suite 312
401 West Washington Street, Spc. 38
Phoenix, Arizona 85003-2151
(602) 322-7251

Appendix H

Proceedings Reported by Stenographic Court Reporter
Transcript Prepared by Computer-Aided Transcription

* * *

[57] through an Administrative Settlement Agreement involve less oversight by ADEQ compared to the VRP?

A. I believe it did, yes.

THE COURT: Could you explain that to me? Why would the level of oversight be different between a Voluntary Remediation Program and a Settlement Agreement where CERCLA liability would be released?

THE WITNESS: So the Agency's preference is these sites come in to VRP. We have -- we have folks that do not want to go through VRP so they might come in for an Administrative Settlement.

So there are -- there are components in statute of VRP that have to be met as part of VRP. In the Administrative Settlement there's still oversight. There's still oversight. We review reports. We provide comments, but we don't meet every -- every component of VRP because it's outside of VRP. I don't know if that makes sense?

THE COURT: Well, to me, a settlement agreement sounds better than voluntary remediation because there's this benefit of the release of CERCLA liability and liability under WQARF. What is it about VRP that's more onerous or that has a better benefit?

THE WITNESS: So the benefit -- the benefit to the State in VRP is that we get paid for our time and oversight. The agency is a fee-for-service agency.

[58]When we do things outside of VRP, there's -- and I'm not sure about this particular site. We now try to insert their -- that they pay the agency for our oversight and review. I'm not sure -- I can't remember if we did that with this Moreland one, but we do it now to make sure that we're recouping all of the costs that the agency incurs through these administrative settlements.

So I don't want to lead you to believe there's no oversight. There's a lot of oversight in the Administrative Settlement. It's just kind have done ad hoc, if you would say, outside of a particular program.

THE COURT: Thank you.

BY MR. HARNISCH:

Q. And, Ms. Malone, as you sit here, do you know whether the Administrative Settlement Agreement in this case provided for Moreland to cover any of the costs of ADEQ's work?

A. I would have to review it again.

Q. Okay, fair enough.

Ms. Malone, you were asked earlier this morning a series of questions about the Declaration of Environmental

Appendix H

Use Restriction or DEUR that was recorded in September of 2004. Do you recall that?

A. Yes.

Q. Okay. And do you recall whether or not that 2004 DEUR was amended?

* * *